Jan Delaval please

10/302

Access DB# _____

SEARCH REQUEST FORM

Scientific and Technical Information Center

Requester's Full Name: SABIHA QAZI Examiner #: 74141 Date: 8/15/03

Art Unit: 1616 Phone Number 305-3910 Serial Number: 10/035,217

Mail Box and Bldg/Room Location: 2D19 Results Format Preferred (circle): PAPER DISK E-MAIL

If more than one search is submitted, please prioritize searches in order of need.

****

Please provide a detailed statement of the search topic, and describe as specifically as possible the subject matter to be searched. Include the elected species or structures, keywords, synonyms, acronyms, and registry numbers, and combine with the concept or utility of the invention. Define any terms that may have a special meaning. Give examples or relevant citations, authors, etc, if known. Please attach a copy of the cover sheet, pertinent claims, and abstract.

Title of Invention: Vit D3 Derivatives

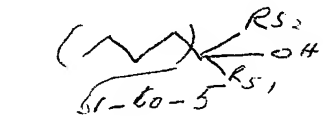
Inventors (please provide full names): KAZUYA TAKENOUCHI etal

Earliest Priority Filing Date: 3/4/2000 PCT/JP99/05826

**For Sequence Searches Only* Please include all pertinent information (parent, child, divisional, or issued patent numbers) along with the appropriate serial number.*

Please search for the Compd of formula (I) where E is (1-5)

Vit. D.

for broader search 

Please search attached sheet

Thank you

****

STAFF USE ONLY		Type of Search		Vendors and cost where applicable	
Searcher:		NA Sequence (#)		STN	✓
Searcher Phone #:	4498	AA Sequence (#)		Dialog	
Searcher Location:		Structure (#)	✓	Questel/Orbit	
Date Searcher Picked Up:	8/18/03	Bibliographic		Dr.Link	
Date Completed:	8/18/03	Litigation		Lexis/Nexis	
Searcher Prep & Review Time:		Fulltext		Sequence Systems	
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Online Time:	+35	Other		Other (specify)	

PTO-1590 (8-01)

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FILE 'REGISTRY' ENTERED AT 14:47:48 ON 17 AUG 2003
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Property values tagged with IC are from the ZIC/VINITI data file
provided by InfoChem.

STRUCTURE FILE UPDATES:   15 AUG 2003  HIGHEST RN 567484-39-3
DICTIONARY FILE UPDATES:  15 AUG 2003  HIGHEST RN 567484-39-3

TSCA INFORMATION NOW CURRENT THROUGH JANUARY 6, 2003

  Please note that search-term pricing does apply when
  conducting SmartSELECT searches.

Crossover limits have been increased.  See HELP CROSSOVER for details.

Experimental and calculated property data are now available.  See HELP
PROPERTIES for more information.  See STNote 27, Searching Properties
in the CAS Registry File, for complete details:
http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

=> d sta que l20
L3                STR
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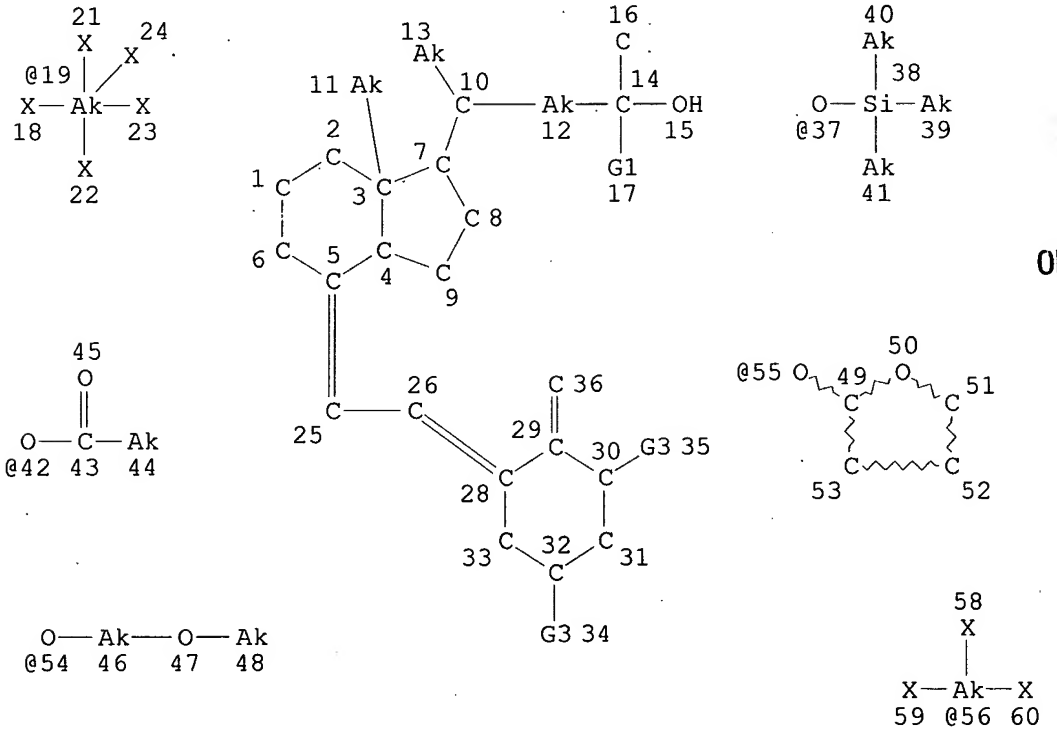


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CONNECT IS M1  RC AT  53
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED
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Jean Delaval
Reference Librarian
Biotechnology & Chemical Library
571-272-2507 – 703-308-4498
jean.delaval@uspto.gov

GRAPH ATTRIBUTES:
RSPEC 28 5 49
NUMBER OF NODES IS 57

STEREO ATTRIBUTES: NONE
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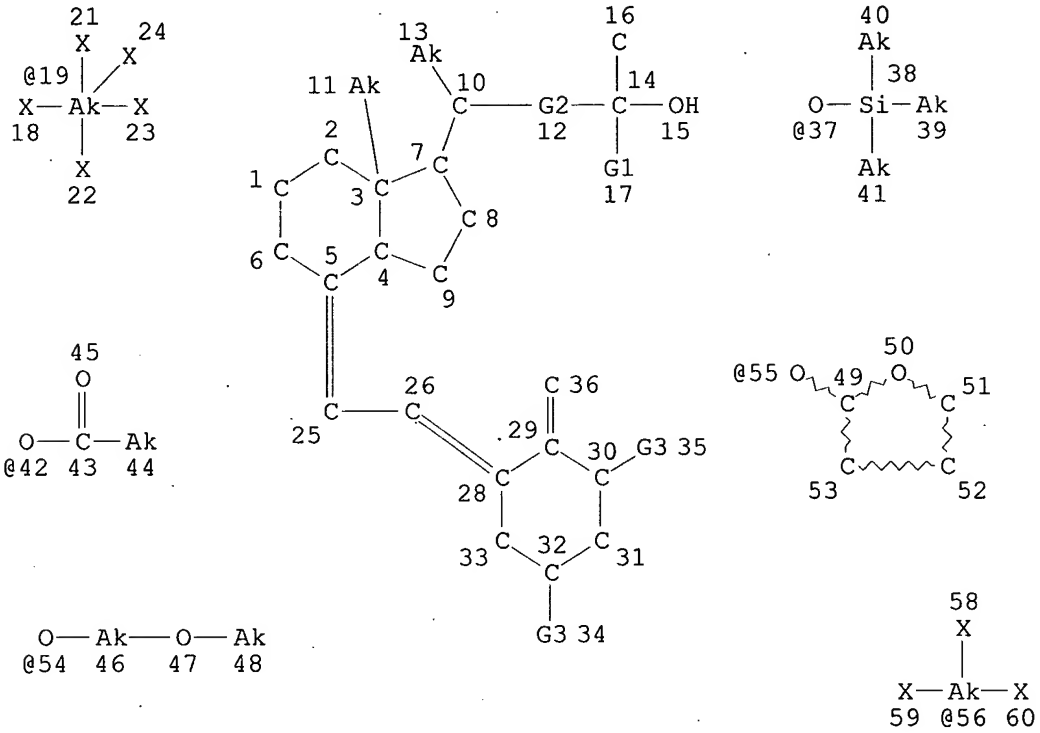
L10 STR



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DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

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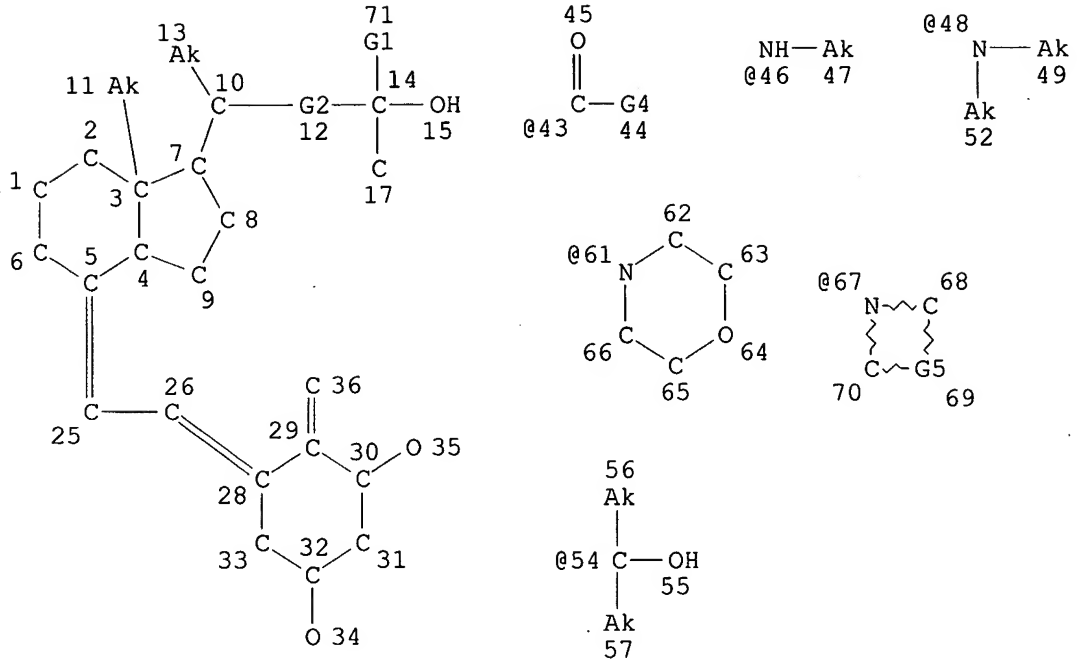

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RSPEC 61 67 7 28
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STEREO ATTRIBUTES: NONE
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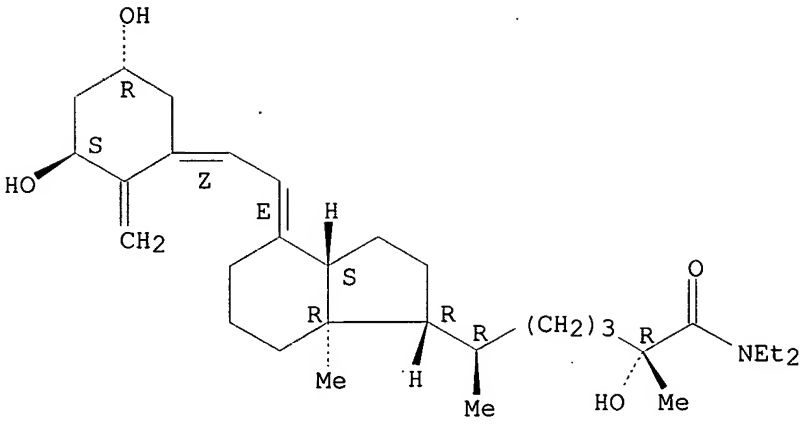
L20 7 SEA FILE=REGISTRY ABB=ON PLU=ON L19 NOT (C28H44O6 OR C29H46O6)

=> d ide can tot l20

L20 ANSWER 1 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 266344-80-3 REGISTRY
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
MF C31 H51 N O4
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPAT2, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1 REFERENCES IN FILE CA (1937 TO DATE)
1 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 132:322032

L20 ANSWER 2 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 266344-78-9 REGISTRY
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
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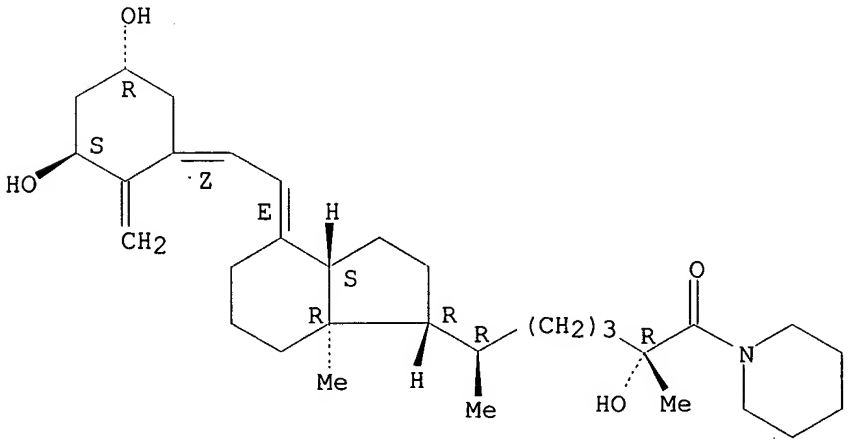
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPAT2, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



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1 REFERENCES IN FILE CA (1937 TO DATE)
1 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 132:322032

L20 ANSWER 3 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 266344-76-7 REGISTRY
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.betá.,5Z,7E,25R)- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
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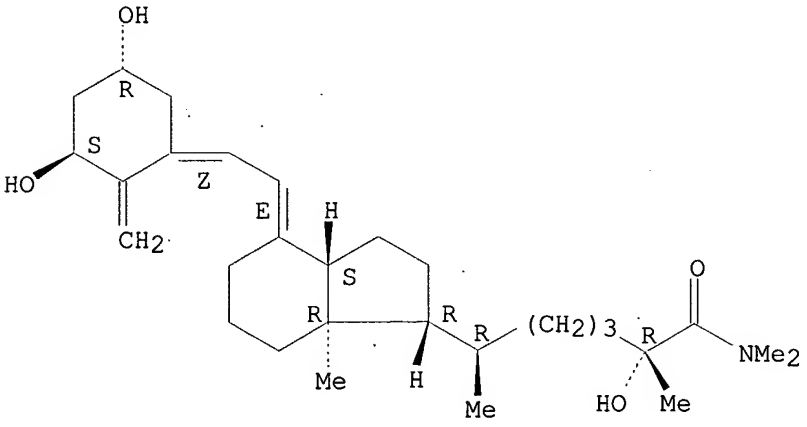
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPAT2, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



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1 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 132:322032

L20 ANSWER 4 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 266344-72-3 REGISTRY
CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
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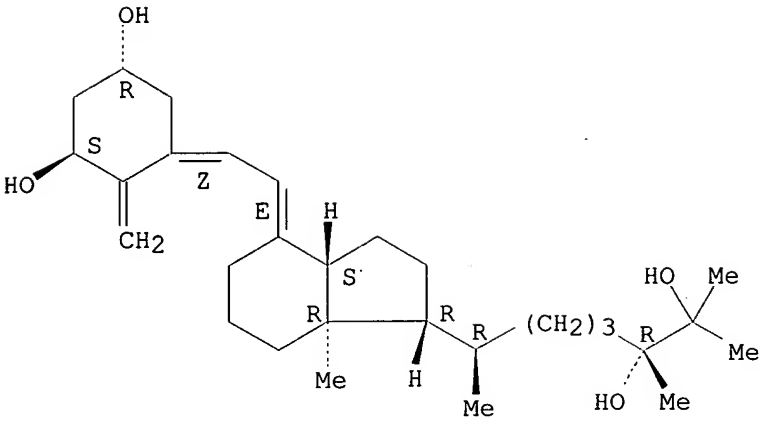
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPAT2, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



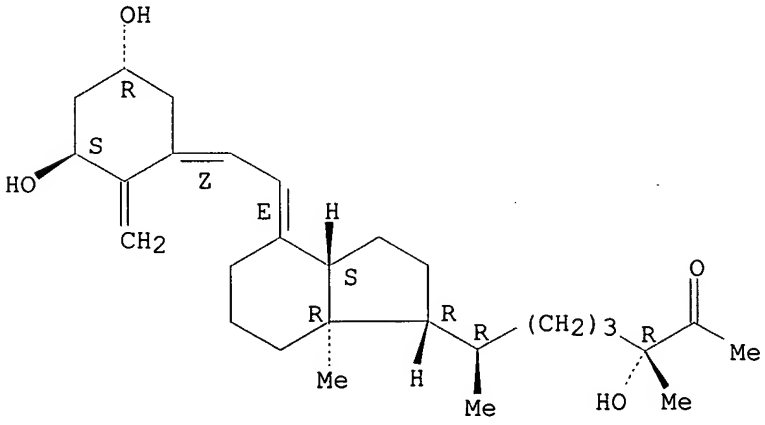
PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1 REFERENCES IN FILE CA (1937 TO DATE)
1 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 132:322032

L20 ANSWER 5 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 266344-71-2 REGISTRY
CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
MF C28 H44 O4
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPAT2, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



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1 REFERENCES IN FILE CA (1937 TO DATE)
1 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 132:322032

L20 ANSWER 6 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 186489-58-7 REGISTRY
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
MF C28 H46 O4
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPATFULL

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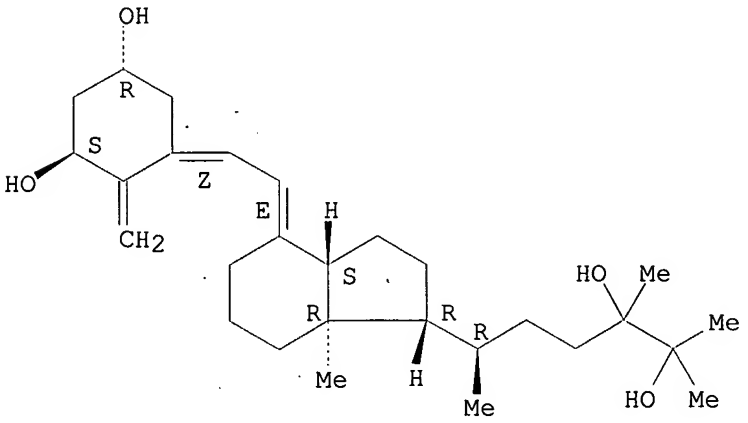
Double bond geometry as shown.



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

4 REFERENCES IN FILE CA (1937 TO DATE)
4 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 138:332

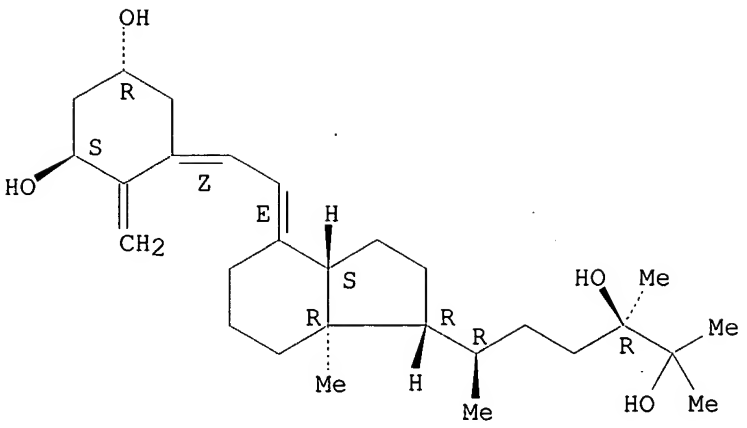
REFERENCE 2: 137:210938

REFERENCE 3: 126:139903

REFERENCE 4: 126:139902

L20 ANSWER 7 OF 7 REGISTRY COPYRIGHT 2003 ACS on STN
RN 179189-36-7 REGISTRY
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)
FS STEREOSEARCH
MF C28 H46 O4
SR CA
LC STN Files: CA, CAPLUS, TOXCENTER, USPATFULL

Absolute stereochemistry.
Double bond geometry as shown.



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

5 REFERENCES IN FILE CA (1937 TO DATE)
5 REFERENCES IN FILE CAPLUS (1937 TO DATE)

REFERENCE 1: 130:209851

REFERENCE 2: 129:197986

REFERENCE 3: 126:139903

REFERENCE 4: 126:139902

REFERENCE 5: 125:123721

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PRE-1967 CHEMICAL ABSTRACTS FILE WITH HOUR-BASED PRICING
FILE COVERS 1907-1966
FILE LAST UPDATED: 01 May 1997 (19970501/UP)

This file contains CAS Registry Numbers for easy and accurate substance identification. Title keywords, authors, patent assignees, and patent information, e.g., patent numbers, are now searchable from 1907-1966. TIFF images of CA abstracts printed between 1907-1966 are available in the PAGE display formats.

This file supports REG1stRY for direct browsing and searching of all substance data from the REGISTRY file. Enter HELP FIRST for more information.

=> s l20
L21 0 L20

=> fil hcaplus
FILE 'HCAPLUS' ENTERED AT 14:48:01 ON 17 AUG 2003
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FILE COVERS 1907 - 17 Aug 2003 VOL 139 ISS 8
FILE LAST UPDATED: 15 Aug 2003 (20030815/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s l20

L22 8 L20

=> d all hitstr tot

L22 ANSWER 1 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 2002:928238 HCAPLUS
DN 138:332
TI Method for treating and preventing hyperparathyroidism with active vitamin D compounds
IN Mazess, Richard B.; Strugnell, Stephen A.; Knutson, Joyce C.
PA Bone Care International, Inc., USA
SO U.S. Pat. Appl. Publ., 17 pp., Cont.-in-part of U.S. 6,376,479.
CODEN: USXXCO
DT Patent
LA English
IC ICM A61K031-59
NCL 514167000
CC 1-10 (Pharmacology)
Section cross-reference(s): 2, 63
FAN.CNT 19

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 2002183288	A1	20021205	US 2002-127005	20020419
	US 5602116	A	19970211	US 1995-415488	19950403
	US 5707980	A	19980113	US 1997-798958	19970211
	US 5869473	A	19990209	US 1997-907659	19970808
	US 6242434	B1	20010605	US 1998-86969	19980529
	US 6376479	B1	20020423	US 2000-501093	20000209
PRAI	US 1995-415488	A1	19950403		
	US 1997-798958	A3	19970211		
	US 1997-907659	A2	19970808		
	US 1997-907660	B2	19970808		
	US 1998-86969	A2	19980529		
	US 2000-501093	A2	20000209		
	US 1988-227371	B1	19880802		
	US 1990-569412	A1	19900817		
	US 1991-812056	B1	19911217		
	US 1992-812056	B1	19920305		
	US 1993-119895	A2	19930910		

OS MARPAT 138:332
AB This invention relates to a method for treating or preventing

hyperthyroidism assocd. with aging and/or with Aging-Related Vitamin D Deficiency (ARVDD) syndrome by administering a sufficient amt. of an active vitamin D compd. utilizing a variety of effective treatment protocols. The invention further relates to treating or preventing one or more of the following conditions, e.g., (1) primary vitamin D deficiency, (2) 1,25-(OH)2D3 deficiency, and (3) 1,25-(OH)2D3 resistance included within the syndrome of ARVDD. Fourteen renal patients enrolled in a clin. trial to study secondary hyperparathyroidism showed baseline intact parathyroid hormone (iPTH) levels greater than 1000 pg/mL (range: 1015-4706 pg/mL). The initial dose of 1.alpha.-(OH)D2 (10 .mu.g-3 times/wk) was increased (max., 20 .mu.g-3 times/wk) or decreased as necessary to attain and maintain iPTH in the range of 150-300 pg/mL. After 11-12 wk of treatment, the iPTH levels of all but two of the patients had decreased to below 1000 pg/mL, and the iPTH levels in nine of the patients had decreased to below 510 pg/mL.

ST vitamin D compd treatment hyperparathyroidism aging; aging related vitamin D deficiency syndrome hyperparathyroidism prevention; parathyroid hormone lowering hydroxyvitamin D2 hyperparathyroidism

IT Aging, animal
Drug delivery systems
Human
Hyperparathyroidism
Hyperthyroidism
Mammalia
Osteoporosis
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Disease, animal
(aging-related vitamin D deficiency syndrome, hyperthyroidism assocd. with; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Mineral elements, biological studies
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(bone, coadministration of agent reducing loss of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Bone
(coadministration of agent reducing loss of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Estrogens
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(conjugated, coadministration of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Kidney, disease
(end stage, secondary hyperparathyroidism treatment in relation to; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Drug delivery systems
(injections, i.v.; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Bone
(minerals, coadministration of agent reducing loss of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Drug delivery systems
(mucosal; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Drug delivery systems
(nasal; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT Drug delivery systems
(oral; active vitamin D compds. for treating and preventing

hyperparathyroidism assocd. with aging)
IT Drug delivery systems
(parenterals; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT Toxins
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(pertussin; coadministration of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT Menopause
(postmenopause; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT Hyperparathyroidism
(secondary, treatment of, in end stage renal disease; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT Hyperparathyroidism
(tertiary; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT Drug delivery systems
(transdermal; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 13598-36-2D, Phosphonic acid, alkylidenebis- derivs., compds.
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(Bisphosphonate, coadministration of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 9002-64-6, Parathyroid hormone
RL: ADV (Adverse effect, including toxicity); BSU (Biological study, unclassified); BIOL (Biological study)
(active vitamin D compd. for lowering blood serum levels of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 41294-56-8, 1.alpha.-(OH)D3 57333-96-7, 1.alpha.,24(R)-Dihydroxyvitamin D3
RL: ADV (Adverse effect, including toxicity); BIOL (Biological study)
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 1406-16-2, Vitamin D 7440-70-2, Calcium, biological studies
RL: BSU (Biological study, unclassified); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 1406-16-2D, Vitamin D, hydroxy compds. 54573-75-0, 1.alpha.-Hydroxyvitamin D2 58050-56-9, 24-Hydroxyvitamin D2 60133-18-8, 1.alpha.,25-Dihydroxyvitamin D2 124043-51-2, 1.alpha.,24-Dihydroxyvitamin D2 131249-38-2, 1.alpha.,25-Dihydroxyvitamin D4 133876-00-3D, 1.alpha.-Hydroxyvitamin D, compds. 143032-85-3, 1.alpha.-Hydroxyvitamin D4 156316-85-7, 1.alpha.,24(S)-Dihydroxyvitamin D2 157893-62-4, 1.alpha.,24-Dihydroxyvitamin D4 **186489-58-7** 254448-88-9, 24-Hydroxyvitamin D4 457048-34-9
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 14265-44-2, Phosphate, biological studies
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(binder; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
IT 1406-16-2D, Vitamin D, compds. 7440-42-8, Boron, biological studies 7681-49-4D, Sodium fluoride, compds. 9007-12-9, Calcitonin 13408-78-1, Cobalamin
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL

(Biological study); USES (Uses)
(coadministration of; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

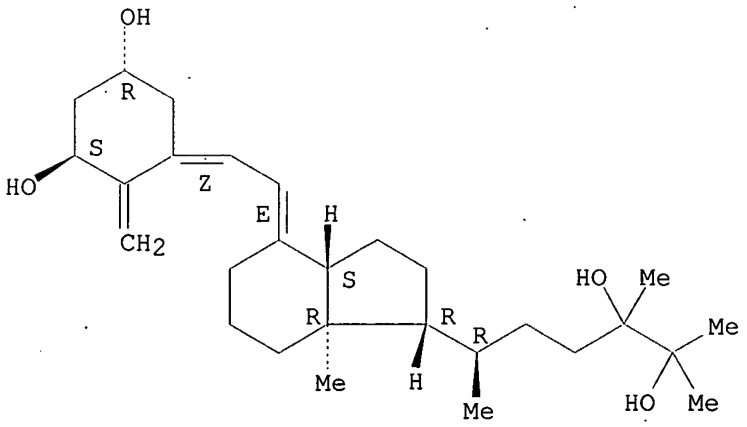
IT 32222-06-3, 1,25-Dihydroxy vitamin D3
RL: ADV (Adverse effect, including toxicity); BSU (Biological study, unclassified); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(deficiency or resistance, aging-related vitamin D deficiency syndrome including; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT 62-54-4, Calcium acetate 471-34-1, Calcium carbonate, biological studies
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(phosphate binder; active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

IT **186489-58-7**
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)

RN 186489-58-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 2 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 2002:696655 HCAPLUS
DN 137:210938
TI Treatment of hyperproliferative diseases using active vitamin D analogues
IN Mazess, Richard B.
PA Bone Care International, Inc., USA
SO U.S. Pat. Appl. Publ., 15 pp., Cont.-in-part of U. S. Ser. No. 891,814.
CODEN: USXXCO
DT Patent
LA English
IC ICM A61K031-59
NCL 514167000
CC 1-6 (Pharmacology)
FAN.CNT 19

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 2002128240	A1	20020912	US 2001-995911	20011128
	US 5763429	A	19980609	US 1996-781910	19961230

US 6537982 B1 20030325 US 1998-596149 19980223
US 2002025950 A1 20020228 US 2001-891814 20010626
US 6503893 B2 20030107
WO 2003045333 A2 20030605 WO 2002-US38263 20021126
WO 2003045333 A3 20030724
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
PRAI US 1996-781910 A3 19961230
US 1998-596149 A2 19980223
US 2001-891814 A2 20010626
US 1993-119895 A2 19930910
US 1994-265438 A2 19940624
US 1995-415488 A2 19950403
US 1995-486387 A2 19950607
US 2001-995911 A 20011128
OS MARPAT 137:210938

AB The present invention provides a method of inhibiting the hyperproliferative cellular activity of neoplasms and other hyperproliferative diseases with an active vitamin D compd. utilizing a high dose, episodic treatment protocol. Patients with advanced androgen-independent prostate cancer were treated i.v. with 1.alpha.,24-dihydroxyvitamin D2.

ST hyperproliferative disease treatment vitamin D analog; prostate cancer treatment dihydroxyvitamin D2 intravenous

IT Prostate gland, neoplasm
(adenocarcinoma, metastasis; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Prostate gland, neoplasm
(adenocarcinoma; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Bone, disease
(agent treating; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Microtubule
(agents inhibiting; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Bone
(agents; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Antitumor agents
(antibiotic; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Nutrients
(antinutrients; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Antibiotics
(antitumor; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Anthracyclines
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(antitumor; treatment of hyperproliferative diseases using active vitamin D analogs)

IT Vitamin D receptors
RL: BSU (Biological study, unclassified); BIOL (Biological study)

(cells expressing; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Uterus, neoplasm
(cervix; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Intestine, neoplasm
(colon; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Uterus, neoplasm
(endometrium; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Cell proliferation
Disease, animal
(hyperproliferative; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Cell differentiation
(inducers; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Drug delivery systems
(injections, i.v.; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Leukemia
(lymphocytic; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Thyroid gland, neoplasm
(medullary carcinoma; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Leukemia
(myelogenous; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Neck, anatomical
(neoplasm; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Drug delivery systems
(oral; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Bone, neoplasm
(osteosarcoma; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Drug delivery systems
(parenterals; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Eye, neoplasm
(retinoblastoma; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Animal tissue, disease
(soft, neoplasm, sarcoma; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Carcinoma
(squamous cell; treatment of hyperproliferative diseases using active vitamin D analogs)
IT Alkylating agents, biological
Antitumor agents
Bladder, neoplasm
Cytotoxic agents
Drug delivery systems
Head, neoplasm
Human
Liver, neoplasm
Lung, neoplasm
Lymphoma
Mammary gland, neoplasm
Melanoma

Multiple myeloma
Neoplasm
Ovary, neoplasm
Pancreas, neoplasm
Prostate gland, neoplasm
Psoriasis
Sarcoma
Testis, neoplasm
(treatment of hyperproliferative diseases using active vitamin D analogs)

IT 13598-36-2D, Phosphonic acid, alkylidenebis- derivs., compds.
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(Bisphosphonate, antihypercalcemic agents; treatment of hyperproliferative diseases using active vitamin D analogs)

IT 1406-16-2D, Vitamin D, analogs or compds.
RL: BSU (Biological study, unclassified); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(active hypocalcemic; treatment of hyperproliferative diseases using active vitamin D analogs)

IT 33069-62-4, Paclitaxel 40391-99-9
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(coadministration of active vitamin D and; treatment of hyperproliferative diseases using active vitamin D analogs)

IT 7440-70-2, Calcium, biological studies
RL: ADV (Adverse effect, including toxicity); BSU (Biological study, unclassified); BIOL (Biological study)
(hypercalcemia, reduced risk of; treatment of hyperproliferative diseases using active vitamin D analogs)

IT 80449-01-0, Topoisomerase
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(inhibitors; treatment of hyperproliferative diseases using active vitamin D analogs)

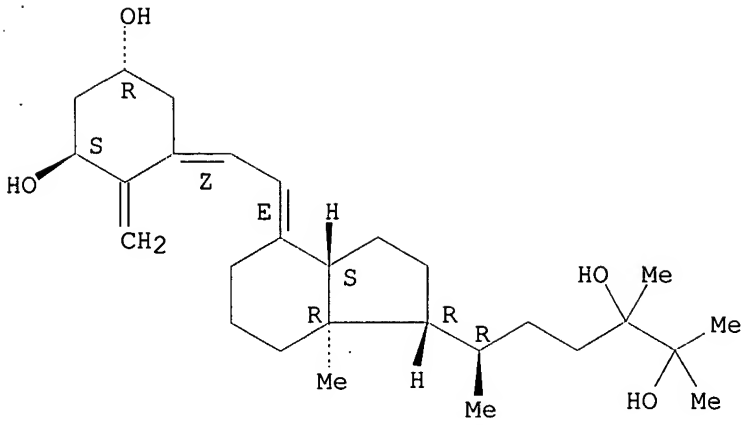
IT 19356-17-3, 25-Hydroxyvitamin D3 124043-51-2, 1.alpha.,24-Dihydroxyvitamin D2 131249-38-2, 1.alpha.,25-Dihydroxyvitamin D4 156316-85-7, 1.alpha.,24(S)-Dihydroxyvitamin D2 156316-86-8 157893-62-4, 1.alpha.,24-Dihydroxy vitamin D4
RL: BSU (Biological study, unclassified); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(treatment of hyperproliferative diseases using active vitamin D analogs)

IT 7440-06-4D, Platinum, compds. 32222-06-3, 1.alpha.,25-Dihydroxyvitamin D3 54573-75-0, 1.alpha.-Hydroxyvitamin D2 58050-56-9, 24-Hydroxyvitamin D2 60133-18-8, 1.alpha.,25-Dihydroxyvitamin D2 143032-85-3, 1.alpha.-Hydroxyvitamin D4 **186489-58-7** 254448-88-9, 24-Hydroxyvitamin D4 457048-34-9
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(treatment of hyperproliferative diseases using active vitamin D analogs)

IT **186489-58-7**
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(treatment of hyperproliferative diseases using active vitamin D analogs)

RN 186489-58-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 3 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 2000:290993 HCAPLUS
DN 132:322032
TI Preparation of vitamin D3 derivatives and remedies for inflammatory respiratory diseases containing the same
IN Takenouchi, Kazuya; Gao, Qingzhi; Manabe, Kenji; Sogawa, Ryo; Takano, Yasuhiro; Ishizuka, Seiichi
PA Teijin Limited, Japan
SO PCT Int. Appl., 145 pp.
CODEN: PIXXD2
DT Patent
LA Japanese
IC ICM C07C401-00
ICS C07F007-18; A61K031-59; A61P003-02; A61P003-14; A61P011-00
CC 32-7 (Steroids)
Section cross-reference(s): 1, 63
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2000024712	A1	20000504	WO 1999-JP5826	19991022
	W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
	RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
	AU 9962281	A1	20000515	AU 1999-62281	19991022
	AU 758792	B2	20030327		
	EP 1123921	A1	20010816	EP 1999-949355	19991022
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO				
	US 6531460	B1	20030311	US 2001-830167	20010423
	US 2002091109	A1	20020711	US 2002-35219	20020104
	US 6548489	B2	20030415		
	US 2002099039	A1	20020725	US 2002-35211	20020104
	US 2002103173	A1	20020801	US 2002-35217	20020104
	US 2002132799	A1	20020919	US 2002-35251	20020104
PRAI	JP 1998-302321	A	19981023		
	JP 1998-362827	A	19981221		
	JP 1998-365207	A	19981222		
	JP 1998-365208	A	19981222		
	JP 1998-365209	A	19981222		

WO 1999-JP5826 W 19991022
US 2001-830167 A3 20010423
OS MARPAT 132:322032
GI

* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB Compds. represented by general formula (I) [wherein R01, R02 being each independently = hydrogen, Me3Si, Et3Si, tert-BuMe2Si, Ac, MeOCH2, or tetrahydro-4H-pyran-2-yl; and Z = a group represented by general formula Q1, Q2, Q3, Q4, (CH2)3C(OH)R51R52; wherein m, n = 0,2; R11, R12 = H, C1-4 alkyl; K = L = M = H; M = H, K and L together form a double bond together with the existing single bond; K = H, L and M together form a double bond together with the existing single bond; CR21R22 = C3-6 cycloalkyl; Q = CFR31, NR31; R21, R22, R23, R31, R45, R46 = H, HO, CO2H, CF3, pentafluoroethyl, C1-4 alkyloxycarbonyl, C2-5 acyloxy, etc.; R32-R35 = H, OH, C1-4 alkyl, C2-5 acyloxy; A, B = H, OH; A and B together form a double bond together with the existing single bond; CXY = CO; one of X and Y = H, the other = OH or C2-5 acyloxy; R41, R42, R43, R44 = H, HO, CF3, pentafluoroethyl, C2-6 acyloxy, C1-4 alkoxy, etc.; D = E = H; D = OH, E = H; D and E or E and R41 together form a double bond together with the existing single bond; R42 = H, HO, CF3, pentafluoroethyl, C2-5 acyloxy, C1-4 alkoxy, etc.; R51 = (un)substituted CONH2, COR55, C(OH)R56R57; R55, R56, R57 = C1-4 alkyl; R52 = Me, Et, CF3, pentafluoroethyl] are prepd. These compds. are useful as active ingredients of the remedies for inflammatory respiratory diseases, malignant tumor, articular rheumatism, osteoporosis, true diabetes, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypofunction of accessory thyroid, or metabolic disorder of cartilage. Thus, intermediate (II) was coupled with (3S,5R)-3,5-bis(trimethylsilyloxy)-1-octen-7-yne in the presence of Ph3P and tris(dibenzylideneacetone)dipalladium-chloroform adduct in PhMe at 100.degree. for 6 h followed by treatment with lithium tetrafluoroborate and H2SO4 in MeCN for 20 min to give title compd. (III). III, administered at 1-20 .mu.g/kg to air way of golden hamster , inhibited 20-40% neutrophil infiltration in a LPS-induced pneumonia model. A tablet formulation contg. III was prepd.

ST vitamin D3 deriv prepn treatment inflammatory respiratory disease

IT Thyroid gland
(accessory, hypoactivity of; prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT Respiratory tract
(disease, inflammatory; prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT Cartilage
(metabolic disorder; prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT Acne
Alopecia
Anti-inflammatory agents
Antidiabetic agents
Antihypertensives
Antitumor agents
Arthritis
Dermatitis
Osteoporosis
Psoriasis
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT 7440-70-2, Calcium, biological studies
RL: BPR (Biological process); BSU (Biological study, unclassified); BIOL

(Biological study); PROC (Process)
(hypercalcemia; prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT 67-97-0DP, Vitamin D3, derivs. 266343-22-0P 266343-23-1P
266343-25-3P 266343-28-6P 266343-32-2P 266343-33-3P 266343-35-5P
266343-42-4P 266343-45-7P 266343-49-1P 266343-54-8P 266343-55-9P
266343-58-2P 266343-59-3P 266343-68-4P 266343-69-5P 266343-71-9P
266343-72-0P 266343-75-3P 266343-85-5P 266343-88-8P 266343-91-3P
266343-93-5P 266344-00-7P 266344-11-0P 266344-17-6P 266344-23-4P
266344-26-7P 266344-35-8P 266344-38-1P 266344-39-2P 266344-40-5P
266344-54-1P 266344-58-5P 266344-60-9P 266344-61-0P 266344-64-3P
266344-65-4P 266344-66-5P 266344-67-6P **266344-71-2P**
266344-72-3P 266344-76-7P 266344-78-9P
266344-80-3P
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT 219842-24-7P 219842-25-8P 219842-26-9P 219842-27-0P
RL: BPN (Biosynthetic preparation); PUR (Purification or recovery); RCT (Reactant); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent)
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT 67-64-1, Acetone, reactions 75-11-6, Diiodomethane 75-15-0, Carbon disulfide, reactions 75-77-4, Trimethylsilyl chloride, reactions 98-59-9, p-Toluenesulfonyl chloride 104-94-9, 4-Methoxyaniline 107-21-1, 1,2-Ethanediol, reactions 107-30-2, Chloromethyl methyl ether 110-89-4, Piperidine, reactions 151-50-8, Potassium cyanide 506-59-2, Dimethylamine hydrochloride 660-68-4, Diethylamine hydrochloride 872-50-4, reactions 930-30-3, 2-Cyclopenten-1-one 930-68-7, 2-Cyclohexenone 1034-49-7, (Bromomethyl)triphenylphosphonium bromide 1120-72-5, 2-Methylcyclopentanone 1774-47-6, Trimethylsulfoxonium iodide 2537-48-6, Diethyl cyanomethylphosphonate 2605-67-6, Methyl (triphenylphosphoranylidene)acetate 3282-30-2, Trimethylacetyl chloride 4224-69-5, Methyl 2-bromomethylacrylate 27374-25-0, (1-Ethoxycyclopropyloxy)trimethylsilane 52928-63-9, 1-Hydroxy-2-pyrrolidinone 64190-52-9 66057-04-3, 2,2-Dimethoxycyclopentanone 81037-06-1 85909-08-6 112828-13-4 112924-91-1 134523-96-9 161055-41-0 173388-43-7 173388-56-2 173522-65-1 266343-46-8 266344-59-6 266686-81-1
RL: RCT (Reactant); RACT (Reactant or reagent)
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

IT 66774-80-9P 93489-60-2P 114694-12-1P 124905-24-4P 135604-76-1P
147352-03-2P 160156-85-4P 165465-89-4P 165465-90-7P 171283-36-6P
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219842-35-0P 266343-12-8P 266343-13-9P 266343-14-0P 266343-15-1P
266343-16-2P 266343-17-3P 266343-18-4P 266343-19-5P 266343-20-8P
266343-21-9P 266343-24-2P 266343-27-5P 266343-29-7P 266343-30-0P
266343-31-1P 266343-34-4P 266343-36-6P 266343-37-7P 266343-38-8P
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266343-47-9P 266343-48-0P 266343-50-4P 266343-51-5P 266343-52-6P
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266343-81-1P 266343-82-2P 266344-05-2P 266344-08-5P 266344-14-3P
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266344-53-0P 266344-55-2P 266344-56-3P 266344-57-4P 266344-62-1P
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266344-74-5P 266344-75-6P 266344-77-8P 266344-79-0P 266686-83-3P

266686-86-6P 266686-88-8P 266686-90-2P
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

RE.CNT 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD

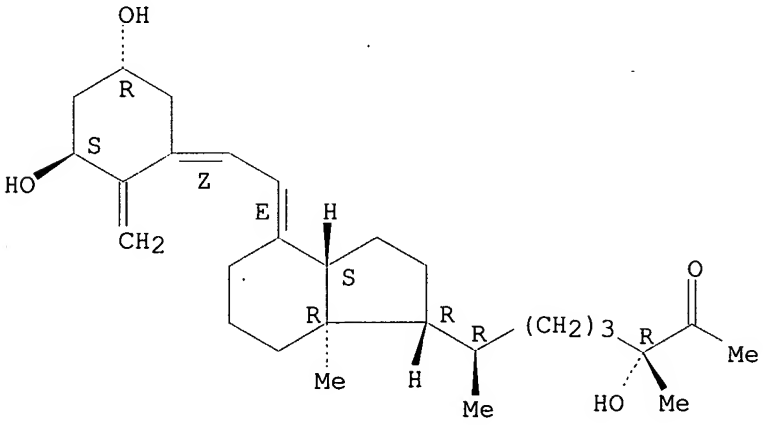
RE

(1) Chugai Pharmaceutical Co Ltd; JP 07173133 A 1995 HCAPLUS
(2) Teijin Limited; JP 06329696 A HCAPLUS
(3) Teijin Limited; US 5604257 A HCAPLUS
(4) Teijin Limited; EP 970948 A1 HCAPLUS
(5) Teijin Limited; EP 619305 A1 1994 HCAPLUS
(6) Teijin Limited; WO 9858909 A1 1998 HCAPLUS
(7) Teikoku Hormone Mfg Co Ltd; JP 1149747 A 1999

IT **266344-71-2P 266344-72-3P 266344-76-7P 266344-78-9P 266344-80-3P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

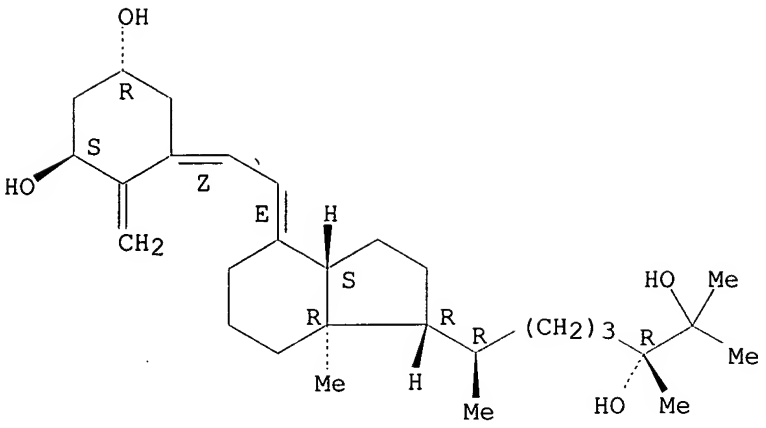
RN 266344-71-2 HCAPLUS
CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



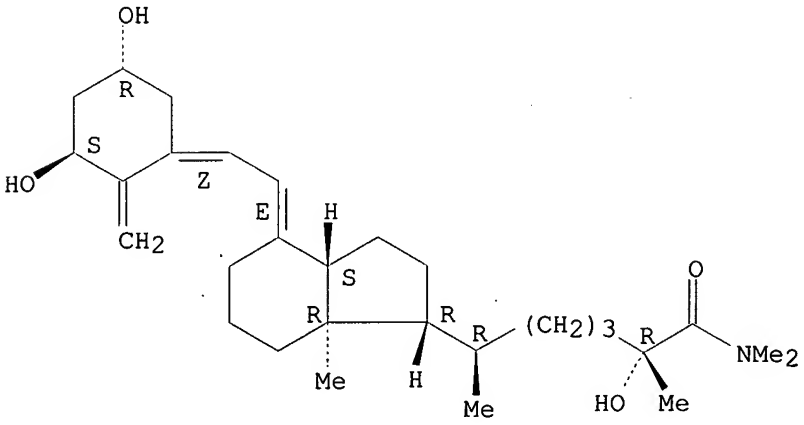
RN 266344-72-3 HCAPLUS
CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



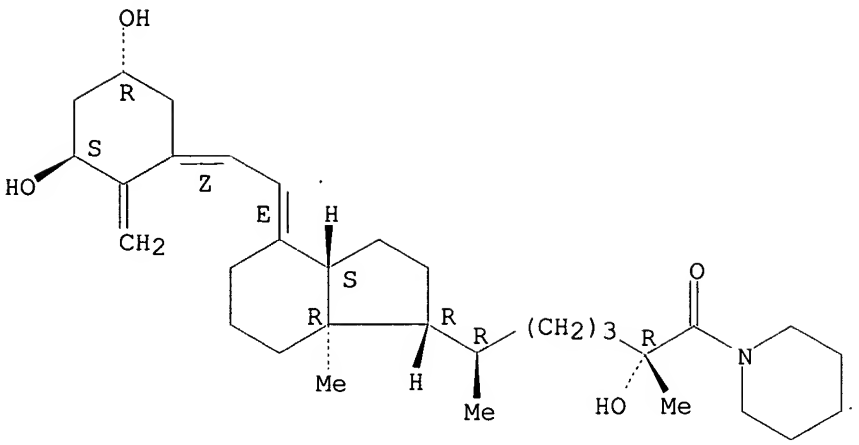
RN 266344-76-7 HCAPLUS
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



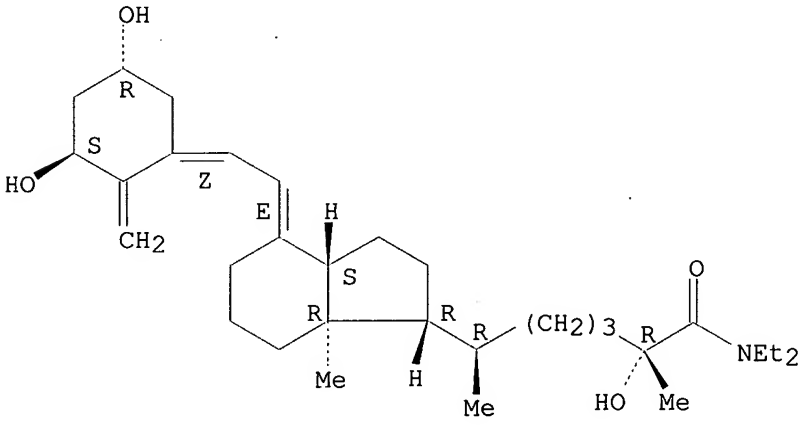
RN 266344-78-9 HCAPLUS
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 HCAPLUS
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

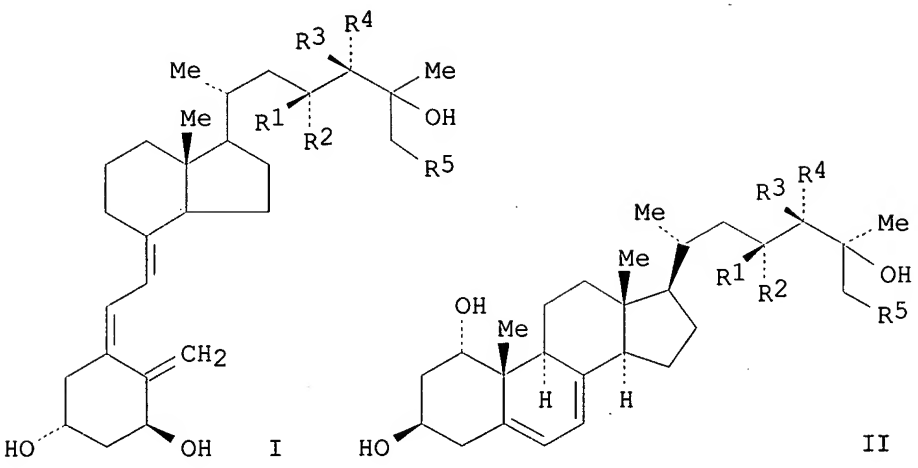
Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 4 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 1999:106958 HCAPLUS
DN 130:209851
TI Preparation of active vitamin D derivatives and their use as bone density improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia
IN Tachibana, Yoji
PA Nisshin Flour Milling Co., Ltd., Japan
SO Jpn. Kokai Tokkyo Koho, 10 pp.
CODEN: JKXXAF
DT Patent
LA Japanese
IC ICM C07C401-00
ICS A61K031-59
CC 32-7 (Steroids)
Section cross-reference(s): 1, 63
FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE

PI JP 11035553 A2 19990209 JP 1997-194200 19970718
PRAI JP 1997-194200 19970718
OS MARPAT 130:209851
GI



AB The derivs. I (R1, R2, R5 = H, OH; R1 = R2 .noteq. OH; R3, R4 = H, OH, Me; R3 = R4 .noteq. H, Me) are prepd. by irradn. of diene compds. II (R1-R5 = same as above) with UV ray, then thermal isomerization. II (R1 = R2 = R3 = H, R4 = Me, R5 = OH) (200 mg) was irradiated with a high-pressure Hg lamp for 10 min and subjected to thermal isomerization to give 24 mg I (R1 = R2 = R3 = H, R4 = Me, R5 = OH). The product showed high affinity to 1,25-dihydroxyvitamin D3 receptor.

ST bone density improver vitamin D prepn; vitamin D prepn immunosuppressant differentiation inducer; UV irradn thermal isomerization diene

IT Mineral elements, biological studies
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(bone; prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT Cell differentiation
(inducers; prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT Bone
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(minerals; prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT Immunosuppressants
(prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT Osteoporosis
(therapeutic agents; prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT **179189-36-7P** 220856-83-7P 220875-68-3P
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of active vitamin D derivs. as bone d. improvers,

differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT 93748-47-1 93748-50-6 125315-65-3 131249-32-6 220856-84-8
RL: RCT (Reactant); RACT (Reactant or reagent)
(prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

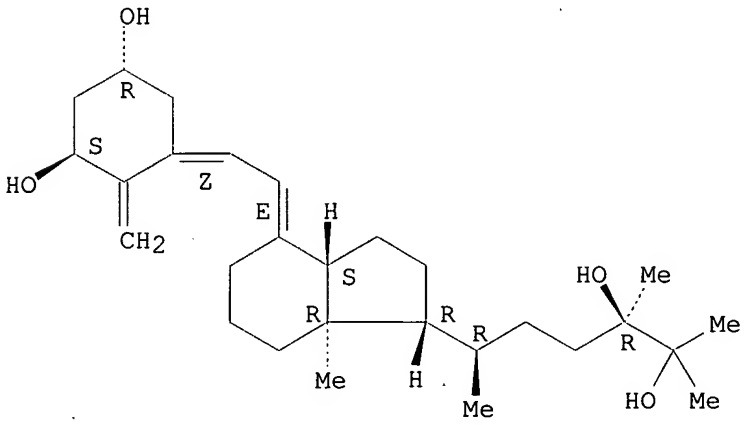
IT 83872-23-5P 152912-16-8P 220856-78-0P 220856-79-1P 220856-80-4P 220856-81-5P 220856-85-9P 220856-86-0P
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT 83872-22-4P 220856-82-6P 220856-87-1P
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

IT **179189-36-7P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of active vitamin D derivs. as bone d. improvers, differentiation inducers, and immunosuppressants causing no hypercalcemia)

RN 179189-36-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 5 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 1998:582860 HCAPLUS
DN 129:197986
TI Method of inhibiting the hyperproliferation of malignant cells with 1.alpha.-hydroxy vitamin D4 and analogs, pharmaceutical and cosmetic compositions, and preparation of 5,6-cis-1.alpha.-hydroxy vitamin D4
IN Knutson, Joyce C.; Bishop, Charles W.
PA Bone Care International, Inc., USA
SO U.S., 12 pp., Cont.-in-part of U.S. Ser. No. 265,438.
CODEN: USXXAM
DT Patent
LA English

IC ICM A61K031-59
NCL 514167000
CC 1-6 (Pharmacology)
Section cross-reference(s): 32, 63
FAN.CNT 19

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 5798345	A	19980825	US 1995-486387	19950607
	US 6025346	A	20000215	US 1994-265438	19940624
	US 5488120	A	19960130	US 1994-296084	19940824
	US 5801164	A	19980901	US 1995-480310	19950607
	US 5756783	A	19980526	US 1995-524889	19950907
	WO 9640153	A1	19961219	WO 1996-US9221	19960606
	W: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, IS, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, TJ, TM, TT				
	RW: KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
	AU 9663791	A1	19961230	AU 1996-63791	19960606
	AU 718625	B2	20000420		
	EP 831839	A1	19980401	EP 1996-923223	19960606
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI				
	CN 1186435	A	19980701	CN 1996-194460	19960606
	JP 11506791	T2	19990615	JP 1996-501597	19960606
	BR 9608488	A	19991130	BR 1996-8488	19960606
	US 5763429	A	19980609	US 1996-781910	19961230
	CA 2222593	AA	19961219	CA 1997-2222593	19970606
	US 6537982	B1	20030325	US 1998-596149	19980223
PRAI	US 1990-586854	B1	19900921		
	US 1991-800045	B2	19911129		
	US 1992-886554	B1	19920520		
	US 1994-265438	A2	19940624		
	US 1992-827173	B1	19920129		
	US 1992-991493	B1	19921217		
	US 1993-119895	A2	19930910		
	US 1994-261730	B3	19940617		
	US 1995-415488	A2	19950403		
	US 1995-486387	A	19950607		
	WO 1996-US9221	W	19960606		
	US 1996-781910	A3	19961230		

AB 1.alpha.-Hydroxy vitamin D4 and analogs, preferably 1,24 dihydroxy vitamin D4 are useful as active compds. of pharmaceutical compns. for the inhibition of hyperproliferative activity of malignant cells. Prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4 is described.
ST neoplasm inhibition hydroxy vitamin D4
IT Intestine, neoplasm
(colon, inhibitors; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)
IT Antitumor agents
(colon; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)
IT Cosmetics
(creams; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)
IT Antitumor agents
Cosmetics
Drug delivery systems
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation

inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Cell differentiation
(inducers; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Antitumor agents
(leukemia; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Cosmetics
Drug delivery systems
(lotions; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Antitumor agents
(mammary gland; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Mammary gland
(neoplasm, inhibitors; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Drug delivery systems
(ointments, creams; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Drug delivery systems
(ointments; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Drug delivery systems
(oral; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT Drug delivery systems
(topical; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 58-61-7, Adenosine, biological studies 11103-57-4, Vitamin A
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BUU (Biological use, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 58-74-2, Papaverine 131249-38-2 143032-85-3 157893-62-4
179189-36-7
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 7440-70-2, Calcium, biological studies
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence)
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 83465-05-8P
RL: BYP (Byproduct); PREP (Preparation)
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation

inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 511-28-4P, Vitamin D4 516-79-0P 2579-14-8P 58261-88-4P 59969-08-3P 60045-90-1P 143032-83-1P 186489-59-8P 186489-60-1P
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and reaction; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

IT 57-87-4, Ergosterol 108-24-7, Acetic anhydride
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction; hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

RE.CNT 35 THERE ARE 35 CITED REFERENCES AVAILABLE FOR THIS RECORD

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(2) Anon; WO 8700834 1987 HCAPLUS
(3) Anon; WO 9010620 1990 HCAPLUS
(4) Anon; EP A0390097 1990
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(14) Deluca; US 4195027 1980 HCAPLUS
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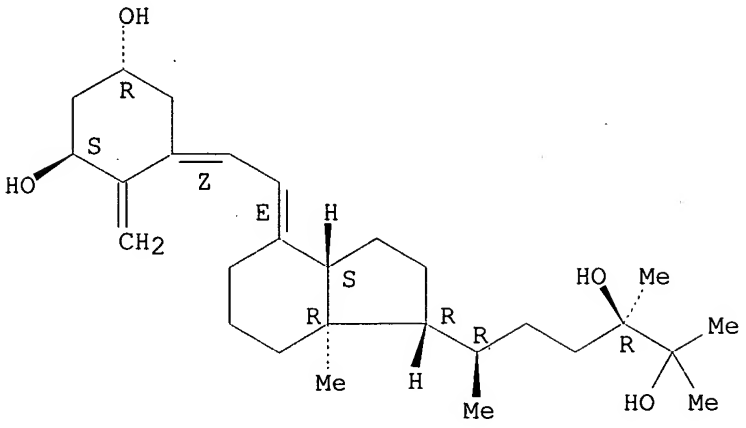
IT **179189-36-7**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)

RN 179189-36-7 HCAPLUS

CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 6 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 1997:134848 HCAPLUS
DN 126:139903
TI Use of vitamin D4 hydroxy derivatives for treating skin disorders, preparation, biological activity, and pharmaceutical and cosmetic compositions
IN Knutson, Joyce C.; Bishop, Charles W.
PA Bone Care International, Inc., USA
SO PCT Int. Appl., 41 pp.
CODEN: PIXXD2
DT Patent
LA English
IC ICM A61K031-59
CC 1-12 (Pharmacology)
Section cross-reference(s): 26, 62, 63
FAN.CNT 19

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 9640154	A1	19961219	WO 1996-US9222	19960606
	W: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, IS, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, TJ, TM, TT				
	RW: KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
	US 5763428	A	19980609	US 1995-484342	19950607
	AU 9662569	A1	19961230	AU 1996-62569	19960606
	EP 831838	A1	19980401	EP 1996-921322	19960606
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI				
	JP 11506792	T2	19990615	JP 1996-501598	19960606
PRAI	US 1995-484342	A	19950607		
	US 1990-586854	B1	19900921		
	US 1991-800045	B2	19911129		
	US 1992-886554	B1	19920520		
	US 1994-265438	A2	19940624		
	WO 1996-US9222	W	19960606		

AB 1.alpha.-Hydroxyvitamin D4 (I) and analogs, including 1,25-dihydroxyvitamin D4 and 1,24-dihydroxyvitamin D4, are disclosed which are useful as active compds. of pharmaceutical compns. for the treatment of disorders of calcium metab. and various skin disorders (skin cancer, dermatitis, eczema, etc.). I was effective increasing serum calcium in

vitamin D-deficient rats. Synthesis of I is described, as are pharmaceutical and cosmetic compns. contg. 1.alpha.,24-dihydroxyvitamin D4. Antiproliferative activity, as well as its use in treatment of osteoporosis and psoriasis, are described.

ST vitamin D4 hydroxy deriv prepn pharmaceutical; cosmetic vitamin D4 hydroxy deriv prepn; skin disorder vitamin D4 hydroxy deriv; cancer skin vitamin D4 hydroxy deriv; osteoporosis psoriasis vitamin D4 hydroxy deriv; dermatitis eczema vitamin D4 hydroxy deriv; calcium disorder vitamin D4 hydroxy deriv

IT Intestine
(calcium transport; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Cosmetics
(creams; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Bone
(d.; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Hydration, physiological
(dermal, cellular proliferative effects of; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Skin, neoplasm
Skin, neoplasm
(inhibitors; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Biological transport
(intestinal calcium; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Cosmetics
Drug delivery systems
(lotions; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Drug delivery systems
(ointments, creams, topical; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Drug delivery systems
(ointments; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Drug delivery systems
(oral; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Drug delivery systems
(parenterals; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Sebum
(secretion, cellular proliferative effects of; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Antitumor agents
Antitumor agents
(skin; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Drug delivery systems
(topical; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Anti-inflammatory agents

Cell differentiation
Cell proliferation
Cosmetics
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Retinoids
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT Dermatitis
Drug delivery systems
Eczema
Osteoporosis
Psoriasis
Skin, disease
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Osteocalcins
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Vitamin D receptors
RL: BPR (Biological process); BSU (Biological study, unclassified); BIOL (Biological study); PROC (Process)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Adrenoceptor agonists
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(.beta.-; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT 41903-66-6D, Chromanol, derivs.
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(Chromanol; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

IT 511-28-4P, Vitamin D4 516-79-0P, 22,23-Dihydroergosterol 2418-45-3P, Ergosterol acetate 2579-14-8P 58261-88-4P 59969-08-3P 60045-90-1P 143032-83-1P, Vitamin D4 tosylate 186489-59-8P 186489-60-1P
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and reaction; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 57-87-4, Ergosterol
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction; vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 7440-70-2, Calcium, biological studies
RL: BOC (Biological occurrence); BPR (Biological process); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence); PROC (Process)
(vitamin D4 hydroxy deriv. in increase of serum calcium level in vitamin D-deficient rats)

IT 1406-16-2, Vitamin D
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(vitamin D4 hydroxy deriv. in increase of serum calcium level in vitamin D-deficient rats)

IT 58-61-7, Adenosine, biological studies 58-74-2, Papaverine 11103-57-4, Vitamin A
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol.

activity, and combination pharmaceutical and cosmetic compns.)

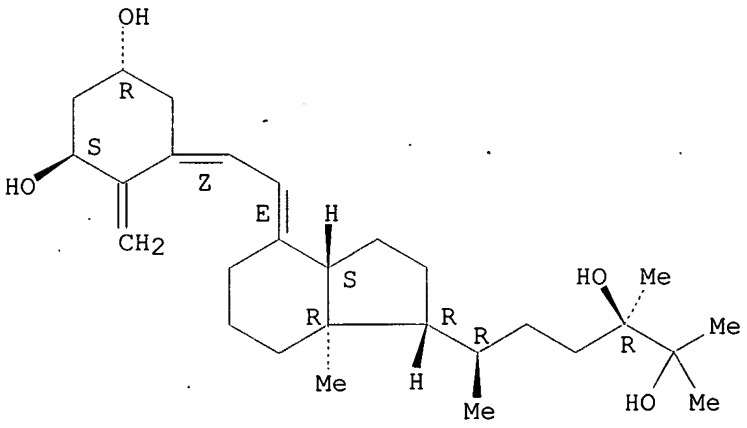
IT 83465-05-8P
RL: SPN (Synthetic preparation); PREP (Preparation)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 131249-38-2 143032-85-3 157893-62-4 **179189-36-7** **186489-58-7**
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT **179189-36-7** **186489-58-7**
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs. for treating skin disorders, prepn., biol. activity, and pharmaceutical and cosmetic compns.)

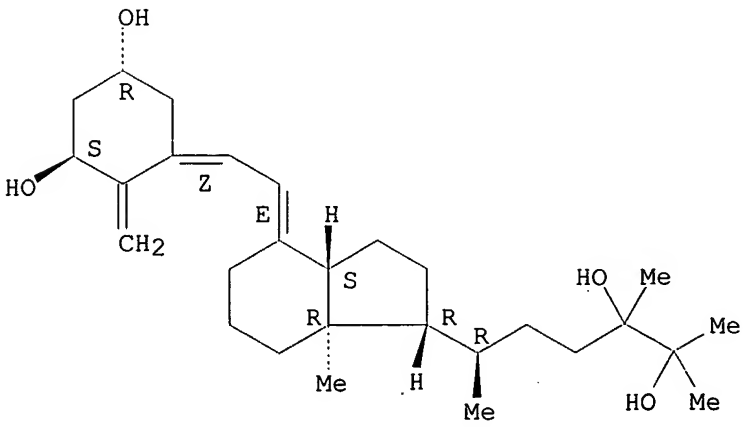
RN 179189-36-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 186489-58-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 7 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 1997:132772 HCAPLUS
DN 126:139902
TI Use of vitamin D4 hydroxy derivatives for treating cancer and disorders of calcium metabolism, preparation, biological activity, and pharmaceutical and cosmetic compositions
IN Knutson, Joyce C.; Bishop, Charles W.
PA Bone Care International, Inc., USA
SO PCT Int. Appl., 38 pp.
CODEN: PIXXD2
DT Patent
LA English
IC ICM A61K031-59
CC 1-12 (Pharmacology)
Section cross-reference(s): 26, 62, 63
FAN.CNT 19

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 9640153	A1	19961219	WO 1996-US9221	19960606
	W: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, IS, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, TJ, TM, TT				
	RW: KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
	US 5798345	A	19980825	US 1995-486387	19950607
	AU 9663791	A1	19961230	AU 1996-63791	19960606
	AU 718625	B2	20000420		
	EP 831839	A1	19980401	EP 1996-923223	19960606
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, NL, SE, PT, IE, FI				
	JP 11506791	T2	19990615	JP 1996-501597	19960606
	BR 9608488	A	19991130	BR 1996-8488	19960606
PRAI	US 1995-486387	A	19950607		
	US 1990-586854	B1	19900921		
	US 1991-800045	B2	19911129		
	US 1992-886554	B1	19920520		
	US 1994-265438	A2	19940624		
	WO 1996-US9221	W	19960606		

AB 1.alpha.-Hydroxyvitamin D4 (I) and analogs, preferably 1,24-dihydroxyvitamin D4, are disclosed which are useful as active compds. of pharmaceutical compns. for the treatment of disorders of calcium metab. and breast and colon cancers. I was effective increasing serum calcium in vitamin D-deficient rats. Synthesis of I is described, as are pharmaceutical and cosmetic compns. contg. 1.alpha.,24-dihydroxyvitamin D4. Antiproliferative activity, as well as its use in treatment of osteoporosis and psoriasis, are described.
ST vitamin D4 hydroxy deriv prepn pharmaceutical; cosmetic vitamin D4 hydroxy deriv prepn; antitumor vitamin D4 hydroxy deriv prepn; psoriasis vitamin D4 hydroxy deriv prepn; osteoporosis vitamin D4 hydroxy deriv prepn; calcium disorder vitamin D4 hydroxy deriv
IT Biological transport
(calcium intestinal; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Intestine
(calcium transport; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Intestine, neoplasm
(colon, inhibitors; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT Antitumor agents
(colon; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Cosmetics
(creams; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Bone
(d.; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Skin
(keratinocyte; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Cosmetics
Drug delivery systems
(lotions; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Antitumor agents
(mammary gland; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Mammary gland
(neoplasm, inhibitors; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Drug delivery systems
(ointments, creams, topical; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Drug delivery systems
(ointments; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Drug delivery systems
(oral; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Drug delivery systems
(topical; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Antitumor agents
Cell differentiation
Cell proliferation
Cosmetics
Drug delivery systems
Osteoporosis
Psoriasis
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Osteocalcins
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)
IT Vitamin D receptors
RL: BPR (Biological process); BSU (Biological study, unclassified); BIOL

(Biological study); PROC (Process)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 511-28-4P, Vitamin D4 516-79-0P, 22,23-Dihydroergosterol 2418-45-3P, Ergosterol acetate 2579-14-8P 58261-88-4P 59969-08-3P 60045-90-1P 143032-83-1P, Vitamin D4 tosylate 186489-59-8P 186489-60-1P
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and reaction; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 57-87-4, Ergosterol
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction; vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 7440-70-2, Calcium, biological studies
RL: BOC (Biological occurrence); BPR (Biological process); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence); PROC (Process)
(vitamin D4 hydroxy deriv. in increase in serum calcium in vitamin D-deficient rats)

IT 1406-16-2, Vitamin D
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(vitamin D4 hydroxy deriv. in increase in serum calcium in vitamin D-deficient rats)

IT 58-61-7, Adenosine, biological studies 58-74-2, Papaverine 11103-57-4, Vitamin A
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and combination pharmaceutical and cosmetic compns.)

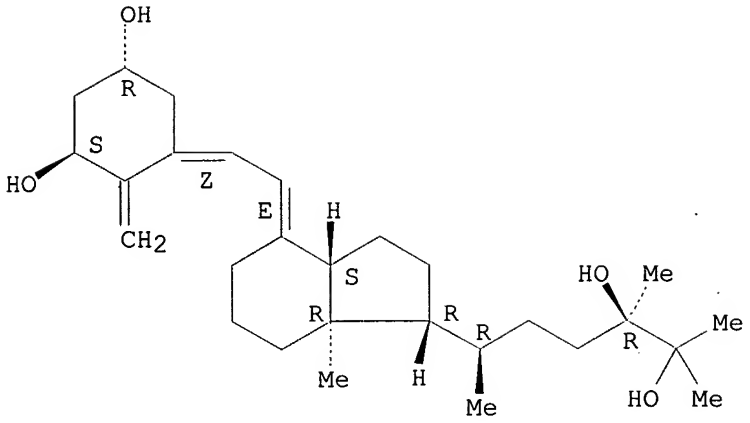
IT 83465-05-8P
RL: SPN (Synthetic preparation); PREP (Preparation)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT 131249-38-2 143032-85-3 157893-62-4 **179189-36-7** **186489-58-7**
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

IT **179189-36-7** **186489-58-7**
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(vitamin D4 hydroxy derivs.for treating cancer and disorders of calcium metab., prepn., biol. activity, and pharmaceutical and cosmetic compns.)

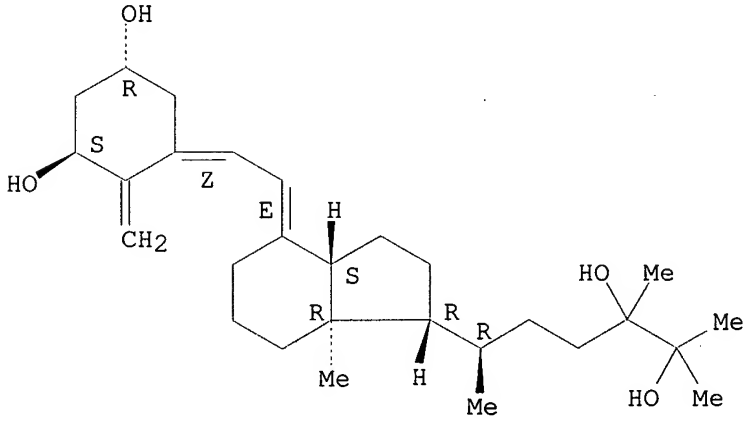
RN 179189-36-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 186489-58-7 HCAPLUS
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L22 ANSWER 8 OF 8 HCAPLUS COPYRIGHT 2003 ACS on STN
AN 1996:447075 HCAPLUS
DN 125:123721
TI Oral 1.alpha.-hydroxyprevitamin D
IN Knutson, Joyce C.; Valliere, Charles R.; Bishop, Charles W.
PA Lunar Corp., USA
SO U.S., 12 pp., Cont.-in-part of U.S. Ser. No. 901,886, abandoned.
CODEN: USXXAM
DT Patent
LA English
IC ICM A01N045-00
NCL 514170000
CC 63-6 (Pharmaceuticals)
Section cross-reference(s): 1
FAN.CNT 4

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 5529991	A	19960625	US 1994-196116	19940222
	ES 2170069	T3	20020801	ES 1993-916684	19930622
	US 5622941	A	19970422	US 1994-188942	19940126

	US 5614513	A	19970325	US 1995-485354	19950607
	US 6147064	A	20001114	US 1995-476420	19950607
	US 6150346	A	20001121	US 1995-474757	19950607
	AU 9660608	A1	19961003	AU 1996-60608	19960722
	AU 696402	B2	19980910		
	US 6133250	A	20001017	US 1996-700798	19960821
	US 5795882	A	19980818	US 1996-775447	19961230
PRAI	US 1992-901886	B2	19920622		
	US 1994-188942	A3	19940126		
	US 1994-196116	A3	19940222		
	US 1995-485354	A2	19950607		

OS MARPAT 125:123721

AB An enteric-coated sustained-release oral dosage form for vitamin D for treatment of osteoporosis and psoriasis and prevention of hypocalcemia and bone loss in hemodialysis is claimed. The compn. comprises a matrix contg. an activated vitamin D or 1.alpha.-hydroxy vitamin D coated with cellulose acetate phthalate or an acrylic polymer of Eudragit type.

ST vitamin D oral enteric sustained release

IT Osteoporosis
Psoriasis
(treatment of; enteric-coated sustained-release oral dosage forms for vitamin D)

IT Pharmaceutical dosage forms
(enteric-coated, sustained-release, oral; enteric-coated sustained-release oral dosage forms for vitamin D)

IT 57-11-4, Octadecanoic acid, biological studies 1406-16-2, Vitamin D 9004-38-0, Cellulose acetate phthalate 25086-15-1, Eudragit L100 32222-06-3, 1.alpha.,25-Dihydroxy cholecalciferol 33434-24-1, Eudragit RS100 41294-56-8, 1.alpha.-Hydroxy cholecalciferol 41461-13-6, 1.alpha.-Hydroxy precholecalciferol 54573-75-0, 1.alpha.-Hydroxy ergocalciferol 57102-09-7, 1.alpha.,25-Dihydroxy precholecalciferol 60133-18-8, 1.alpha.,25-Dihydroxy ergocalciferol 60965-80-2, 1.alpha.,24-Dihydroxy cholecalciferol 64164-40-5, 1.alpha.-Hydroxy-25-fluoro cholecalciferol 64419-01-8 72203-93-1, 1.alpha.,24,25-Trihydroxy cholecalciferol 73030-57-6 74041-05-7 76704-93-3, 1.alpha.,24-Dihydroxy-25-fluoro cholecalciferol 95660-30-3, Eudragit S90 100496-04-6 125732-36-7 127264-16-8, 1.alpha.,24,25-Trihydroxy precholecalciferol 127264-17-9 127264-18-0 131249-38-2, 1.alpha.,25-Dihydroxy vitamin D4 143032-85-3, 1.alpha.-Hydroxy vitamin D4 151136-06-0 153210-43-6, 1.alpha.,25-Dihydroxy previtamin D4 156316-85-7 157893-62-4 179189-32-3 179189-33-4 179189-34-5 179189-35-6 **179189-36-7** 179189-37-8 179189-38-9 182374-18-1
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(enteric-coated sustained-release oral dosage forms for vitamin D)

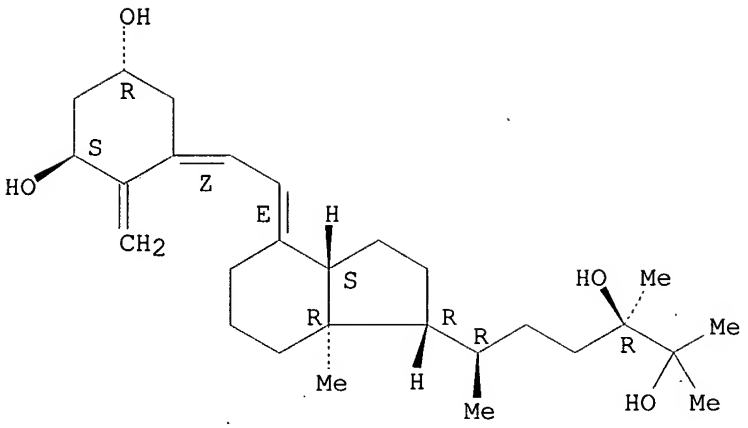
IT 7440-70-2, Calcium, biological studies
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(metabolic disorders, treatment of; enteric-coated sustained-release oral dosage forms for vitamin D)

IT **179189-36-7**
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(enteric-coated sustained-release oral dosage forms for vitamin D)

RN 179189-36-7 HCAPLUS

CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

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CA INDEXING COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'USPAT2' ENTERED AT 14:48:13 ON 17 AUG 2003
CA INDEXING COPYRIGHT (C) 2003 AMERICAN CHEMICAL SOCIETY (ACS)

=> s l20
L23         10 L20

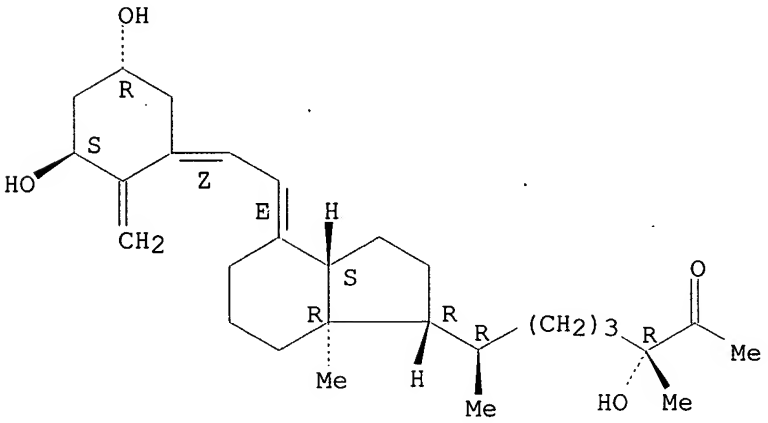
=> d bib abs hitstr tot

L23  ANSWER 1 OF 10  USPATFULL on STN
AN     2003:67760  USPATFULL
TI     Vitamin D, derivatives and remedies for inflammatory respiratory
       diseases containing the same
IN     Takenouchi, Kazuya, Tokyo, JAPAN
       Gao, Qingzhi, Tokyo, JAPAN
       Manabe, Kenji, Tokyo, JAPAN
       Sogawa, Ryo, Tokyo, JAPAN
       Takano, Yasuhiro, Tokyo, JAPAN
       Ishizuka, Seiichi, Tokyo, JAPAN
PA     Teijin Limited, Osaka, JAPAN (non-U.S. corporation)
PI     US 6531460          B1   20030311
       WO 2000024712  20000504
AI     US 2001-830167           20010423 (9)
       WO 1999-JP5826           19991022
PRAI   JP 1998-302321      19981023
       JP 1998-362827      19981221
       JP 1998-365207      19981222
       JP 1998-365208      19981222
       JP 1998-365209      19981222
DT     Utility
FS     GRANTED
EXNAM  Primary Examiner: Qazi, Sabiha
LREP   Sughrue Mion, PLLC
CLMN   Number of Claims: 20
ECL    Exemplary Claim: 1
DRWN   0 Drawing Figure(s); 0 Drawing Page(s)
LN.CNT 3903
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB     Compounds expressed by the following general formula (1),  ##STR1##
       ##STR2##
```

The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension; alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

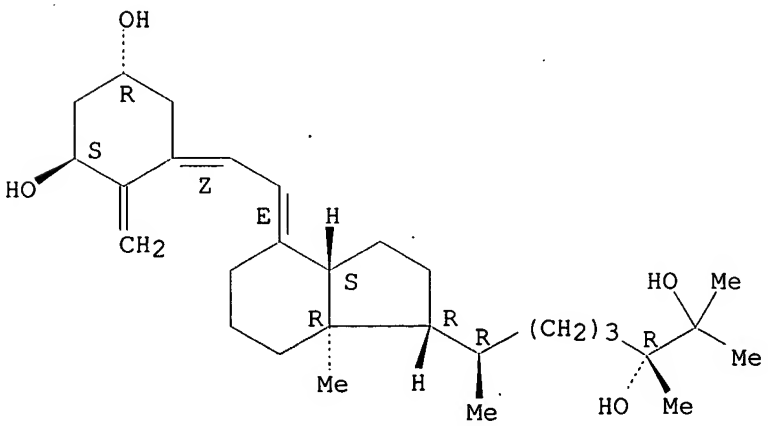
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P**
266344-78-9P 266344-80-3P
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)
RN 266344-71-2 USPATFULL
CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-72-3 USPATFULL
CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

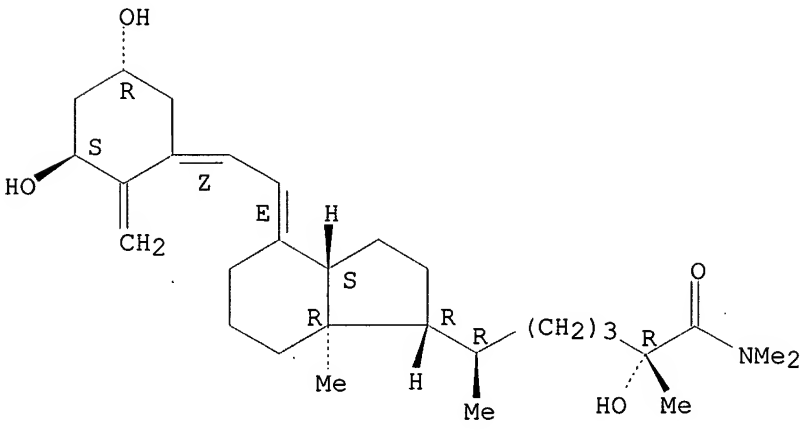
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-76-7 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-

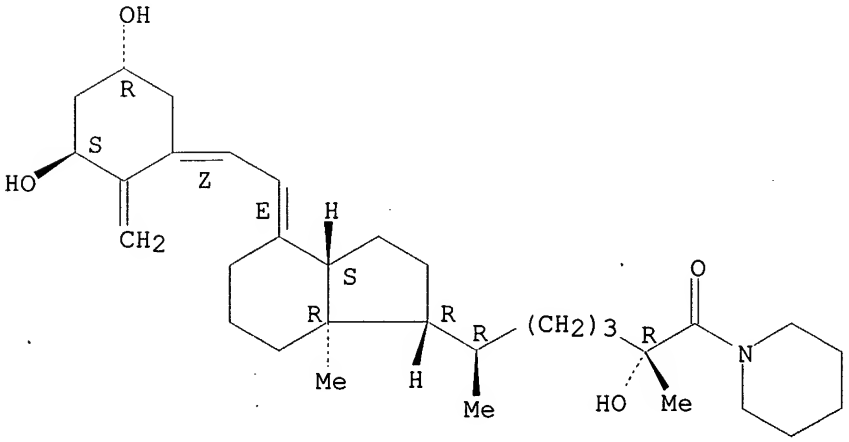
dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



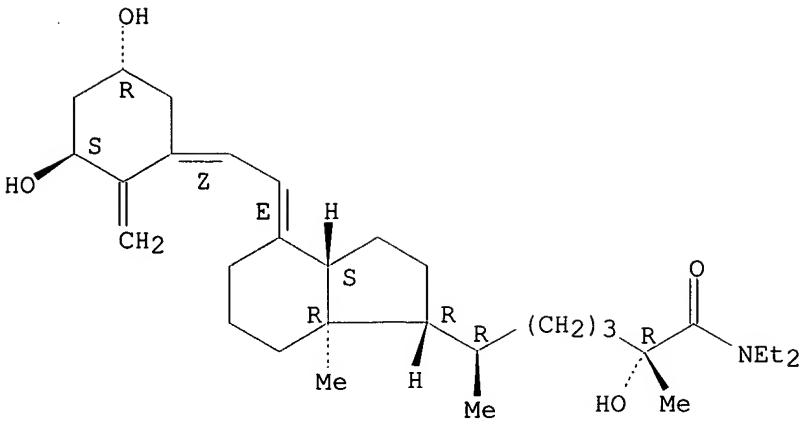
RN 266344-78-9 USPATFULL
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

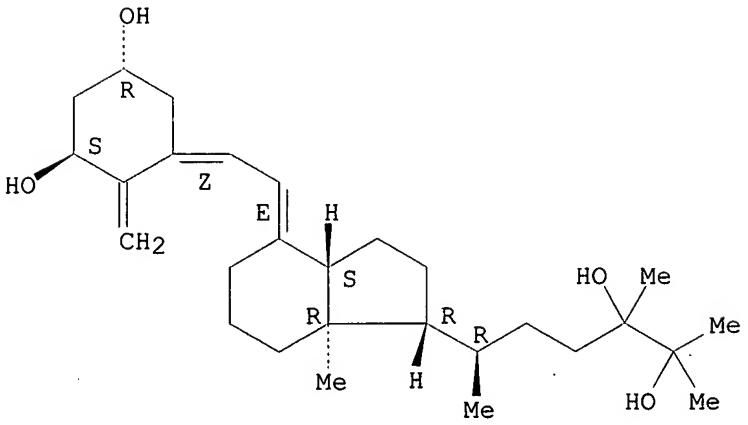
Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 2 OF 10 USPATFULL on STN
AN 2002:323122 USPATFULL
TI Method for treating and preventing hyperparathyroidism
IN Mazess, Richard B., Madison, WI, UNITED STATES
Strugnell, Stephen A., Madison, WI, UNITED STATES
Knutson, Joyce C., Madison, WI, UNITED STATES
PA Bone Care International, Inc., Middleton, WI (U.S. corporation)
PI US 2002183288 A1 20021205
AI US 2002-127005 A1 20020419 (10)
RLI Continuation-in-part of Ser. No. US 2000-501093, filed on 9 Feb 2000, GRANTED, Pat. No. US 6376479 Continuation-in-part of Ser. No. US 1998-86969, filed on 29 May 1998, GRANTED, Pat. No. US 6242434 Continuation-in-part of Ser. No. US 1997-907659, filed on 8 Aug 1997, GRANTED, Pat. No. US 5869473 Continuation-in-part of Ser. No. US 1997-907660, filed on 8 Aug 1997, ABANDONED Division of Ser. No. US 1997-798958, filed on 11 Feb 1997, GRANTED, Pat. No. US 5707980 Continuation of Ser. No. US 1995-415488, filed on 3 Apr 1995, GRANTED, Pat. No. US 5602116
DT Utility
FS APPLICATION
LREP MICHAEL BEST & FRIEDRICH, LLP, ONE SOUTH PINCKNEY STREET, P O BOX 1806, MADISON, WI, 53701
CLMN Number of Claims: 39
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 1590
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB This invention relates to a method for treating or preventing hyperthyroidism associated with aging and/or with Aging-Related Vitamin D Deficiency (ARVDD) syndrome by administering a sufficient amount of an active vitamin D compound utilizing a variety of effective treatment protocols. The invention further relates to treating or preventing one or more of the following conditions, e.g., (1) primary vitamin D deficiency, (2) 1,25-(OH).sub.2D.sub.3 deficiency, and (3) 1,25-(OH).sub.2D.sub.3 resistance included within the syndrome of ARVDD.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **186489-58-7**
(active vitamin D compds. for treating and preventing hyperparathyroidism assocd. with aging)
RN 186489-58-7 USPATFULL
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 3 OF 10 USPATFULL on STN
AN 2002:243608 USPATFULL
TI Vitamin D3 dervative and treating agent for inflammatory respiratory disease using same
IN Takenouchi, Kazuya, Tokyo, JAPAN
Gao, Qingzhi, Tokyo, JAPAN
Manabe, Kenji, Tokyo, JAPAN
Sogawa, Ryo, Tokyo, JAPAN
Takano, Yasuhiro, Tokyo, JAPAN
Ishizuka, Seiichi, Tokyo, JAPAN
PA TEIJIN LIMITED (non-U.S. corporation)
PI US 2002132799 A1 20020919
AI US 2002-35251 A1 20020104 (10)
RLI Division of Ser. No. US 2001-830167, filed on 23 Apr 2001, PENDING
PRAI JP 1998-302321 19981023
JP 1998-362827 19981221
JP 1998-365207 19981222
JP 1998-365208 19981222
JP 1998-365209 19981222
DT Utility
FS APPLICATION
LREP SUGHRUE MION, PLLC, 2100 Pensylvania Avenue, NW, Washington, DC, 20037-3213
CLMN Number of Claims: 44
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 4222
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB Compounds expressed by the following general formula (1), ##STR1##

[wherein, R.sub.01 and R.sub.02 are each independently a hydrogen atom or a protecting group for a hydroxyl group; Z is one out of the following formulae (1-1), (1-2), (1-3), (1-4) and (1-5)]. ##STR2##

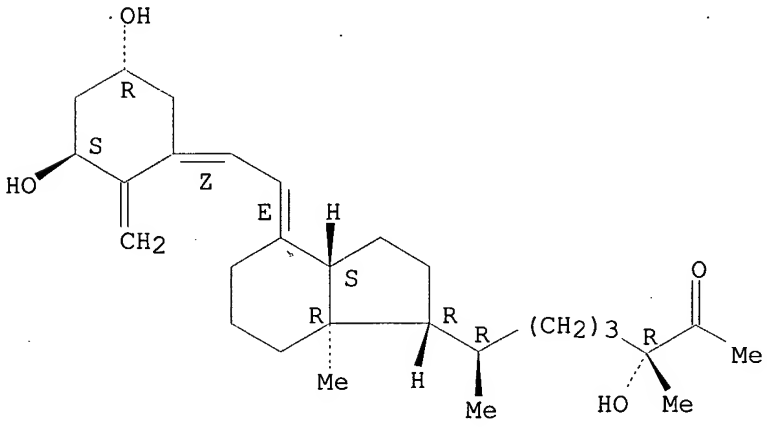
The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P**

266344-78-9P 266344-80-3P
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

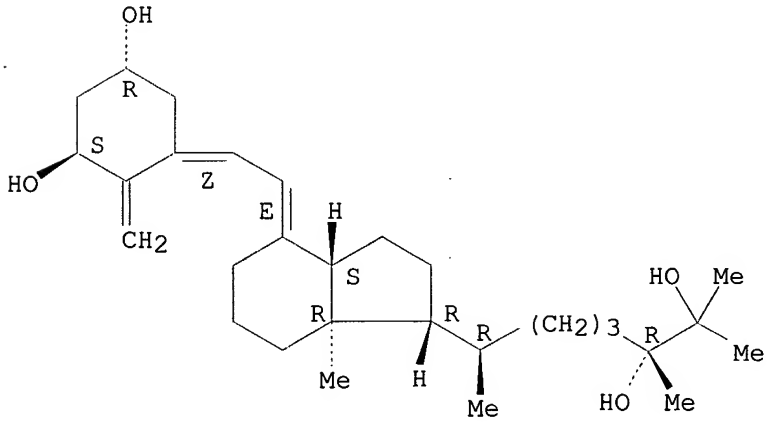
RN 266344-71-2 USPATFULL
CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



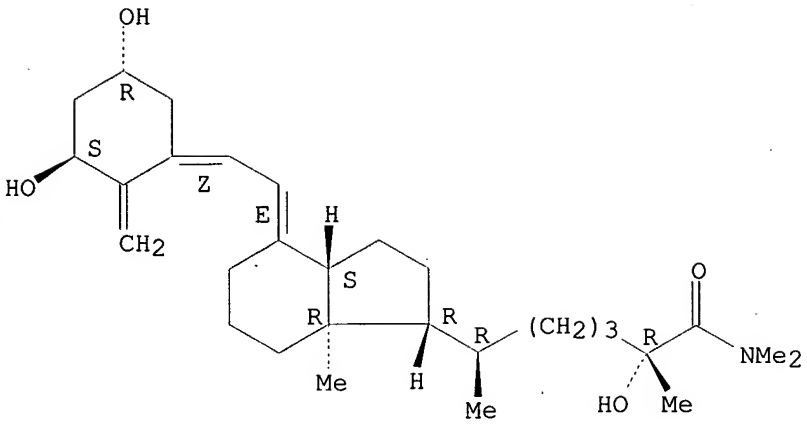
RN 266344-72-3 USPATFULL
CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



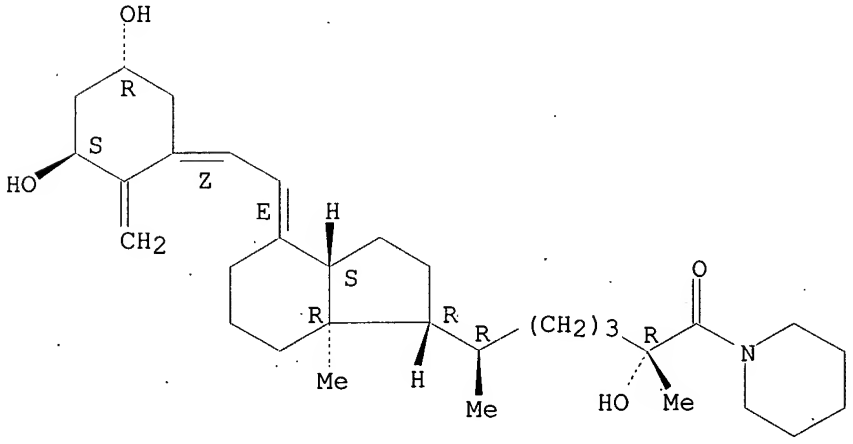
RN 266344-76-7 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



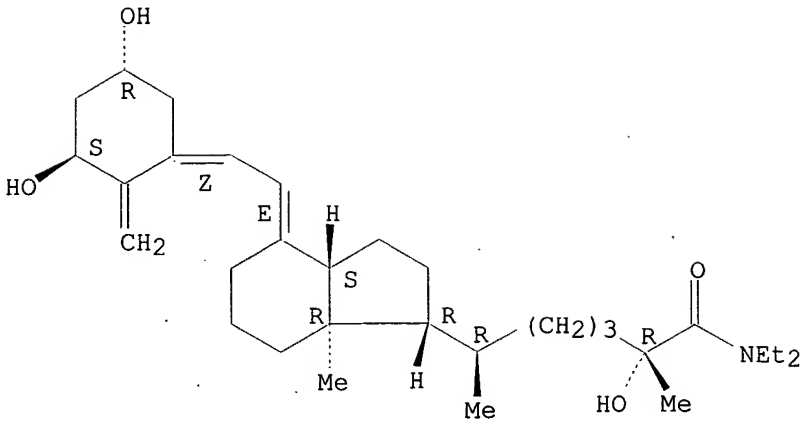
RN 266344-78-9 USPATFULL
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

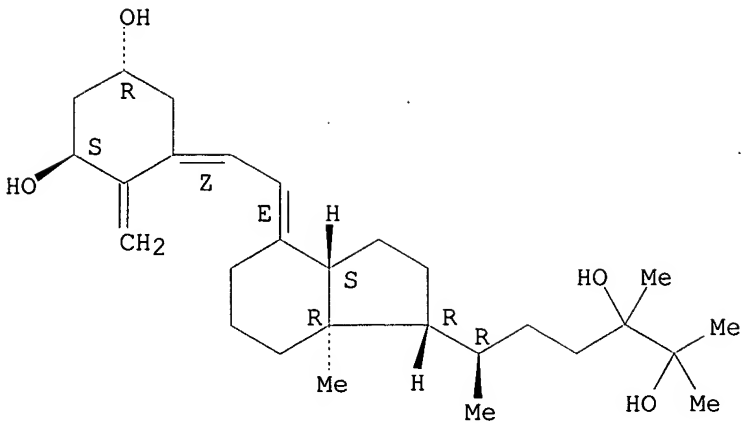
Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 4 OF 10 USPATFULL on STN
AN 2002:236042 USPATFULL
TI Treatment of hyperproliferative diseases using active vitamin D analogues
IN Mazess, Richard B., Madison, WI, UNITED STATES
PA Bone Care International, Inc., Middleton, WI (U.S. corporation)
PI US 2002128240 A1 20020912
AI US 2001-995911 A1 20011128 (9)
RLI Continuation-in-part of Ser. No. US 2001-891814, filed on 26 Jun 2001, PENDING Continuation-in-part of Ser. No. US 1998-596149, filed on 23 Feb 1998, PENDING Division of Ser. No. US 1996-781910, filed on 30 Dec 1996, PATENTED
DT Utility
FS APPLICATION
LREP MICHAEL BEST & FRIEDRICH, LLP, ONE SOUTH PINCKNEY STREET, P O BOX 1806, MADISON, WI, 53701
CLMN Number of Claims: 41
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 1385
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB The present invention provides a method of inhibiting the hyperproliferative cellular activity of neoplasms and other hyperproliferative diseases with an active vitamin D compound utilizing a high dose, episodic treatment protocol.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **186489-58-7**
(treatment of hyperproliferative diseases using active vitamin D analogs)
RN 186489-58-7 USPATFULL
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E,24.xi.)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 5 OF 10 USPATFULL on STN
AN 2002:192102 USPATFULL
TI Vitamin D3 derivative and treating agent for inflammatory respiratory disease using same
IN Takenouchi, Kazuya, Tokyo, JAPAN
Gao, Qingzhi, Tokyo, JAPAN
Manabe, Kenji, Tokyo, JAPAN
Sogawa, Ryo, Tokyo, JAPAN
Takano, Yasuhiro, Tokyo, JAPAN
Ishizuka, Seiichi, Tokyo, JAPAN
PA TEIJIN LIMITED (non-U.S. corporation)
PI US 2002103173 A1 20020801
AI US 2002-35217 A1 20020104 (10)
RLI Division of Ser. No. US 2001-830167, filed on 23 Apr 2001, PENDING
PRAI JP 1998-302321 19981023
JP 1998-362827 19981221
JP 1998-365207 19981222
JP 1998-365208 19981222
JP 1998-365209 19981222
DT Utility
FS APPLICATION
LREP SUGHRUE, MION, ZINN,, MACPEAK & SEAS, PLLC, Suite 800, 2100 Pennsylvania Avenue, N.W., Washington, DC, 20037-3213
CLMN Number of Claims: 44
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 4284
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB Compounds expressed by the following general formula (1), ##STR1##

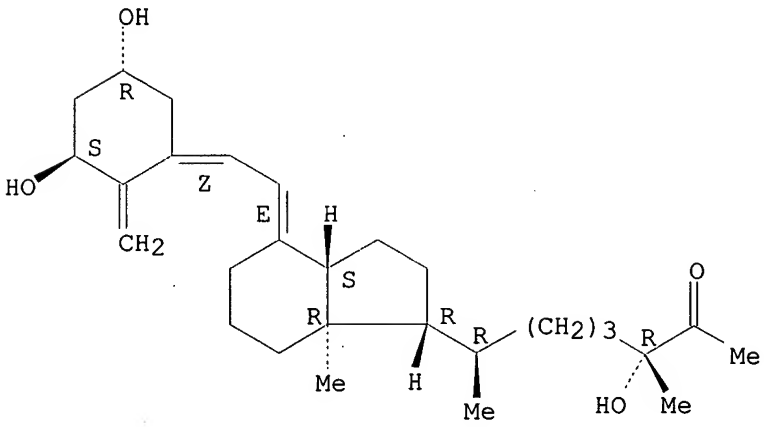
[wherein, R.sub.01 and R.sub.02 are each independently a hydrogen atom or a protecting group for a hydroxyl group; Z is one out of the following formulae (1-1), (1-2), (1-3), (1-4) and (1-5)]. ##STR2##

The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P**
266344-78-9P 266344-80-3P
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory

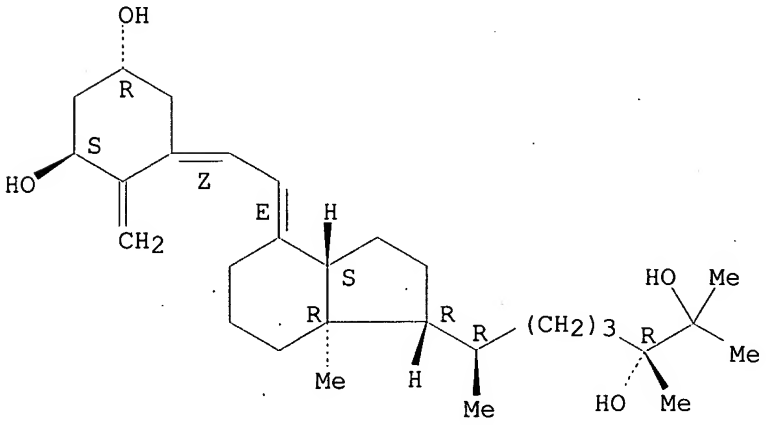
diseases and other diseases)
RN 266344-71-2 USPATFULL
CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



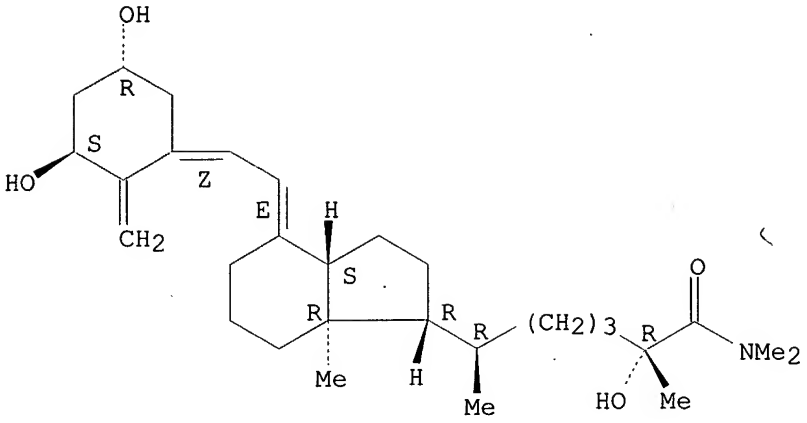
RN 266344-72-3 USPATFULL
CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



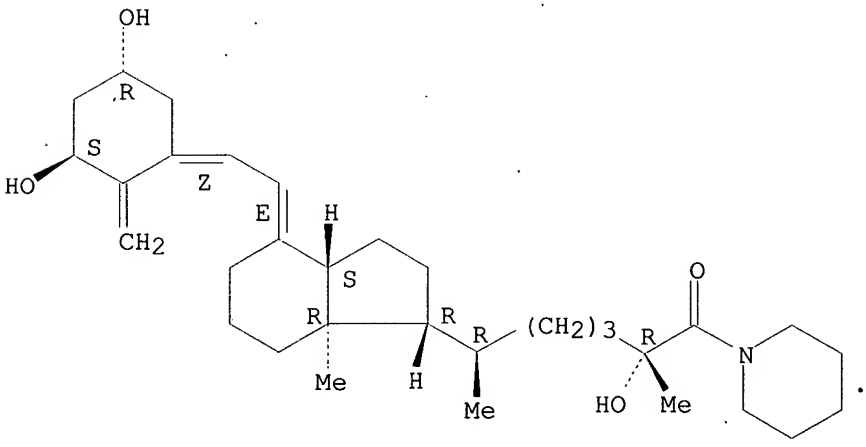
RN 266344-76-7 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



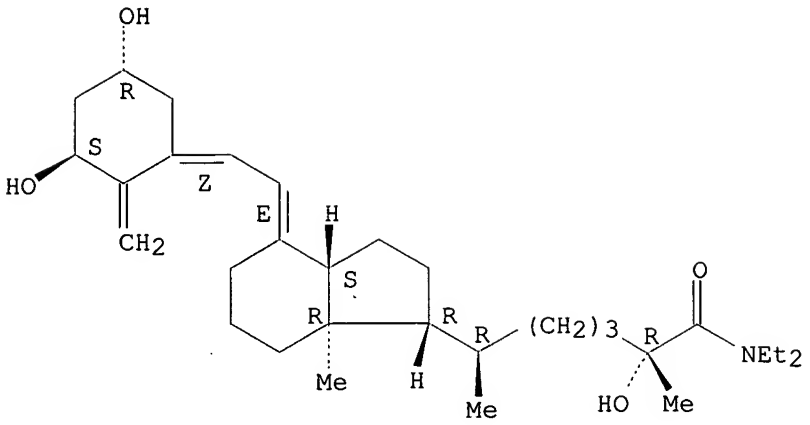
RN 266344-78-9 USPATFULL
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 6 OF 10 USPATFULL on STN
AN 2002:186118 USPATFULL
TI Vitamin D3 derivative and treating agent for inflammatory respiratory disease using same
IN Takenouchi, Kazuya, Tokyo, JAPAN
Gao, Qingzhi, Tokyo, JAPAN
Manabe, Kenji, Tokyo, JAPAN
Sogawa, Ryo, Tokyo, JAPAN
Takano, Yasuhiro, Tokyo, JAPAN
Ishizuka, Seiichi, Tokyo, JAPAN
PA TEIJIN LIMITED (non-U.S. corporation)
PI US 2002099039 A1 20020725
AI US 2002-35211 A1 20020104 (10)
RLI Division of Ser. No. US 2001-830167, filed on 23 Apr 2001, PENDING
PRAI JP 1998-302321 19981023
JP 1998-362827 19981221
JP 1998-365207 19981222
JP 1998-365208 19981222
JP 1998-365209 19981222
DT Utility
FS APPLICATION
LREP SUGHRUE MION, PLLC, 2100 Pennsylvania Avenue, NW, Washington, DC, 20037-3213
CLMN Number of Claims: 44
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 4241
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB Compounds expressed by the following general formula (1), ##STR1##

[wherein, R.sub.01 and R.sub.02 are each independently a hydrogen atom or a protecting group for a hydroxyl group; Z is one out of the following formulae (1-1), (1-2), (1-3), (1-4) and (1-5)]. ##STR2##

The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

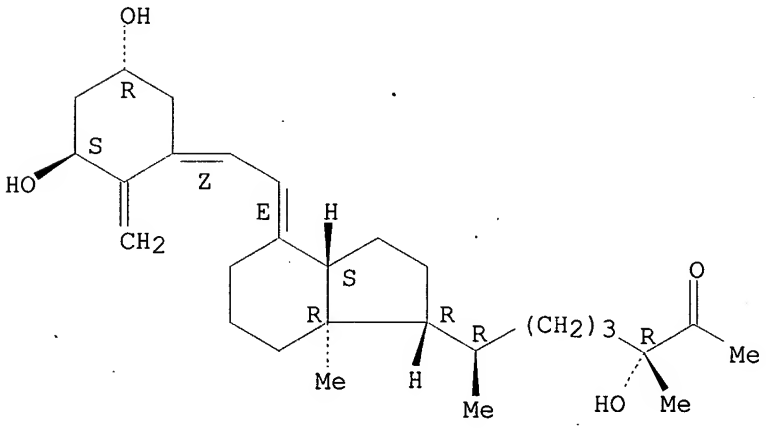
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P**
266344-78-9P 266344-80-3P
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory

diseases and other diseases)

RN 266344-71-2 USPATFULL

CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

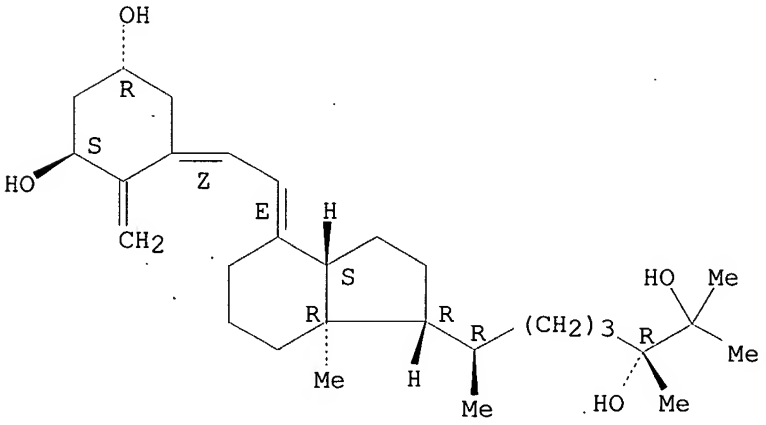
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-72-3 USPATFULL

CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

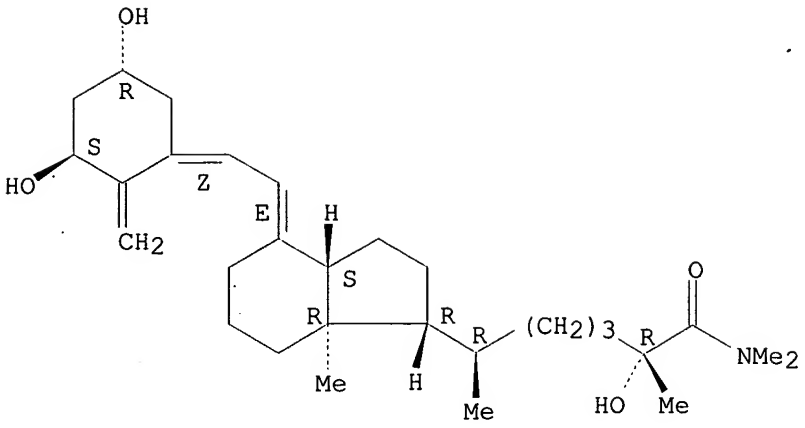
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-76-7 USPATFULL

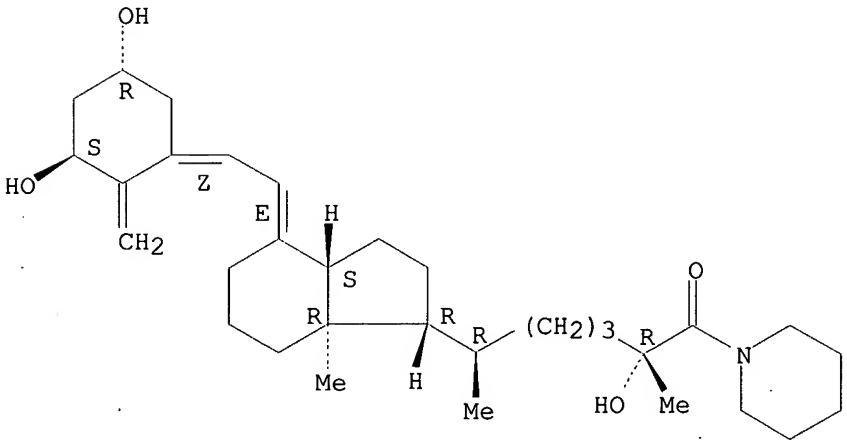
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



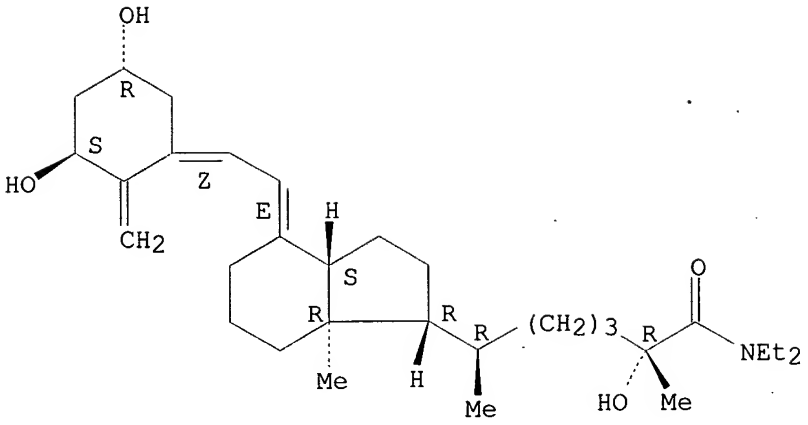
RN 266344-78-9 USPATFULL
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 7 OF 10 USPATFULL on STN
AN 2002:172352 USPATFULL
TI Vitamin D3 derivative and treating agent for inflammatory respiratory disease using same
IN Takenouchi, Kazuya, Tokyo, JAPAN
Gao, Qingzhi, Tokyo, JAPAN
Manabe, Kenji, Tokyo, JAPAN
Sogawa, Ryo, Tokyo, JAPAN
Takano, Yasuhiro, Tokyo, JAPAN
Ishizuka, Seiichi, Tokyo, JAPAN
PA TEIJIN LIMITED (non-U.S. corporation)
PI US 2002091109 A1 20020711
US 6548489 B2 20030415
AI US 2002-35219 A1 20020104 (10)
RLI Division of Ser. No. US 2001-830167, filed on 23 Apr 2001, PENDING
PRAI JP 1998-302321 19981023
JP 1998-362827 19981221
JP 1998-365207 19981222
JP 1998-365208 19981222
JP 1998-365209 19981222
DT Utility
FS APPLICATION
LREP SUGHRUE MION, PLLC, 2100 Pennsylvania Avenue, NW, Washington, DC, 20037-3213
CLMN Number of Claims: 44
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 4194
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB Compounds expressed by the following general formula (1), ##STR1##

[wherein, R.sub.01 and R.sub.02 are each independently a hydrogen atom or a protecting group for a hydroxyl group; Z is one out of the following formulae (1-1), (1-2), (1-3), (1-4) and (1-5)]. ##STR2##

The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

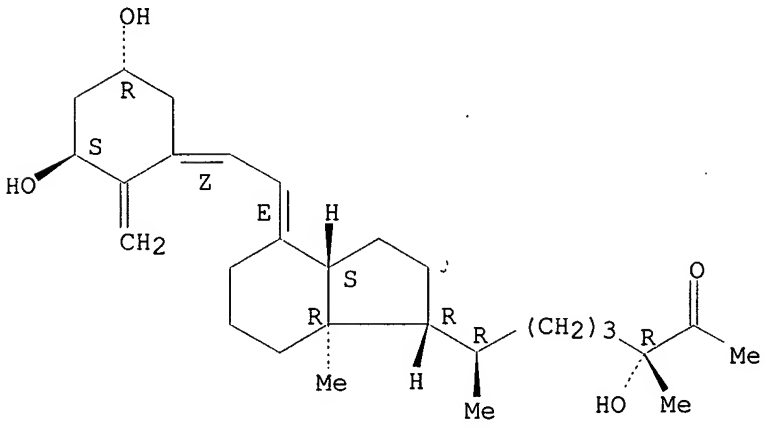
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P 266344-78-9P 266344-80-3P**

(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory diseases and other diseases)

RN 266344-71-2 USPATFULL

CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

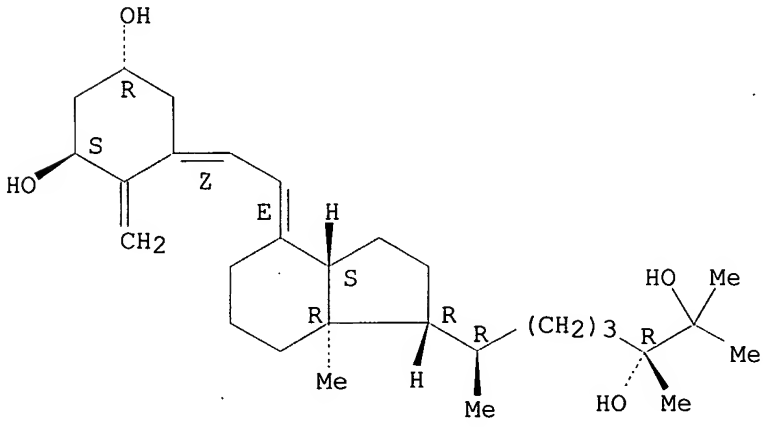
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-72-3 USPATFULL

CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

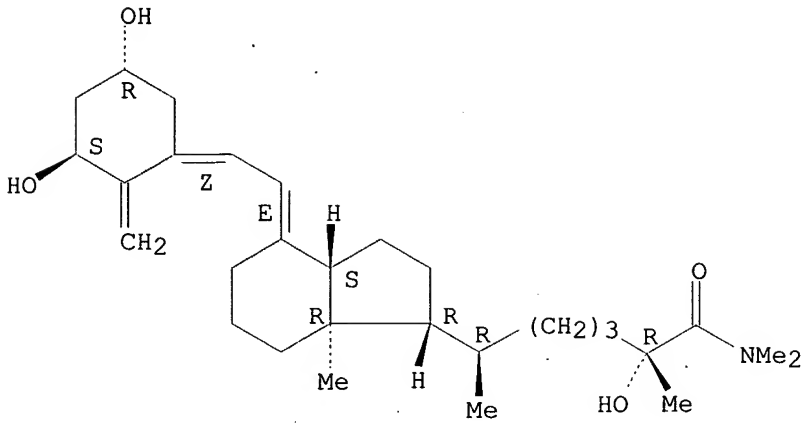
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-76-7 USPATFULL

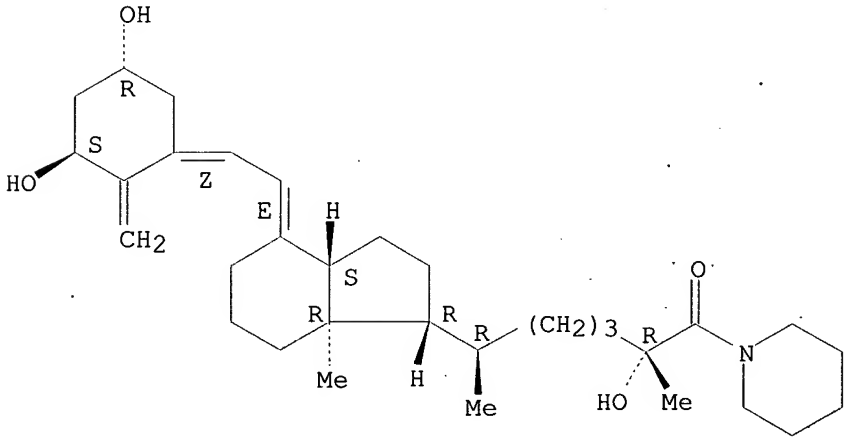
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



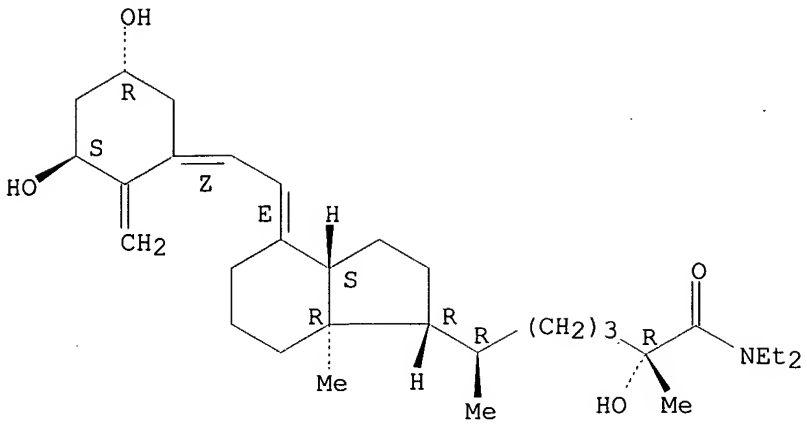
RN 266344-78-9 USPATFULL
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPATFULL
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

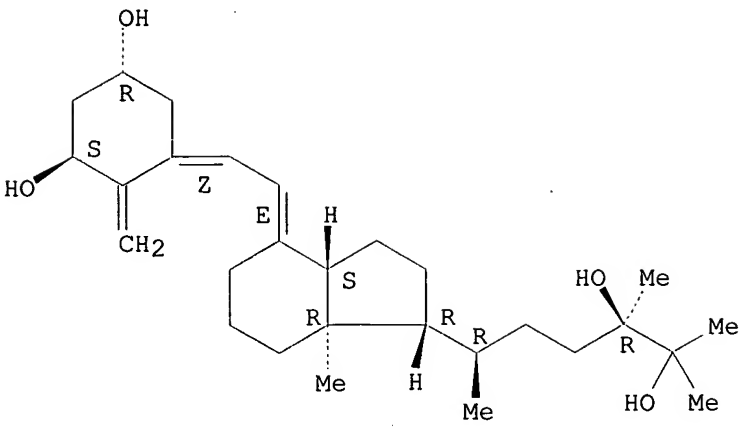
Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 8 OF 10 USPATFULL on STN
AN 1998:101636 USPATFULL
TI Method of inhibiting the hyperproliferation of malignant cells
IN Knutson, Joyce C., Madison, WI, United States
Bishop, Charles W., Verona, WI, United States
PA Bone Care International, Inc., Madison, WI, United States (U.S. corporation)
PI US 5798345 19980825
AI US 1995-486387 19950607 (8)
RLI Continuation-in-part of Ser. No. US 1994-265438, filed on 24 Jun 1994 which is a continuation of Ser. No. US 1992-886554, filed on 20 May 1992, now abandoned which is a continuation-in-part of Ser. No. US 1991-800045, filed on 29 Nov 1991, now abandoned which is a continuation of Ser. No. US 1990-586854, filed on 21 Sep 1990, now abandoned
DT Utility
FS Granted
EXNAM Primary Examiner: Robinson, Allen J.; Assistant Examiner: Badio, Barbara
LREP Welch, Teresa J.Stroud, Stroud, Willink, Thompson & Howard
CLMN Number of Claims: 18
ECL Exemplary Claim: 1
DRWN 2 Drawing Figure(s); 2 Drawing Page(s)
LN.CNT 1016
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB 1.alpha.-hydroxy vitamin D.sub.4 and analogues, preferably 1,24 dihydroxy vitamin D.sub.4, which are useful as active compounds of pharmaceutical compositions for the inhibition of hyperproliferative activity of malignant cells.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **179189-36-7**
(hydroxy vitamin D4 and analogs for malignant cell hyperproliferation inhibition, pharmaceutical and cosmetic compns., and prepn. of 5,6-cis-1.alpha.-hydroxy vitamin D4)
RN 179189-36-7 USPATFULL
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

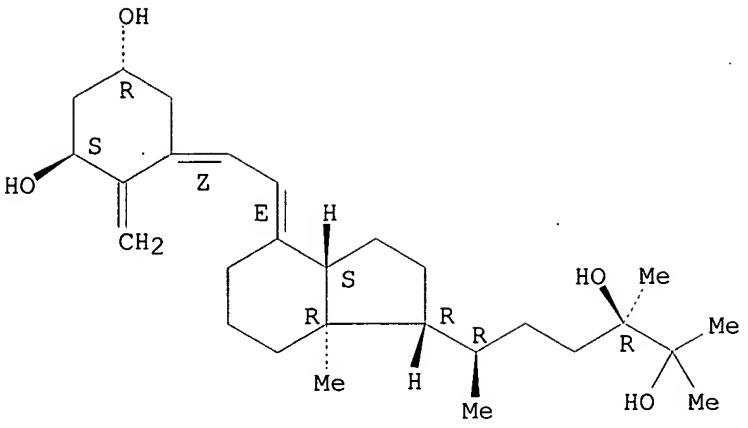
Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 9 OF 10 USPATFULL on STN
AN 96:55748 USPATFULL
TI Oral 1.alpha.-hydroxyprevitamin D
IN Knutson, Joyce C., Madison, WI, United States
Valliere, Charles R., Waunakee, WI, United States
Bishop, Charles W., Verona, WI, United States
PA Lunar Corporation, Madison, WI, United States (U.S. corporation)
PI US 5529991 19960625
AI US 1994-196116 19940222 (8)
RLI Continuation-in-part of Ser. No. US 1992-901886, filed on 22 Jun 1992, now abandoned
DT Utility
FS Granted
EXNAM Primary Examiner: Killos, Paul J.
LREP Welch, Teresa J.Stroud, Stroud, Willink, Thompson & Howard
CLMN Number of Claims: 22
ECL Exemplary Claim: 1
DRWN No Drawings
LN.CNT 1131
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB This invention relates to delayed and sustained release oral medicaments and, more specifically, to delayed and sustained release activated vitamin D, oral medicament.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **179189-36-7**
(enteric-coated sustained-release oral dosage forms for vitamin D)
RN 179189-36-7 USPATFULL
CN 9,10-Secoergosta-5,7,10(19)-triene-1,3,24,25-tetrol, (1.alpha.,3.beta.,5Z,7E)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L23 ANSWER 10 OF 10 USPAT2 on STN
AN 2002:172352 USPAT2
TI Vitamin D3 derivative and treating agent for inflammatory respiratory disease using same
IN Takenouchi, Kazuya, Tokyo, JAPAN
Gao, Qingzhi, Tokyo, JAPAN
Manabe, Kenji, Tokyo, JAPAN
Sogawa, Ryo, Tokyo, JAPAN
Takano, Yasuhiro, Tokyo, JAPAN
Ishizuka, Seiichi, Tokyo, JAPAN
PA Teijin Limited, Osaka, JAPAN (non-U.S. corporation)
PI US 6548489 B2 20030415
AI US 2002-35219 20020104 (10)
RLI Division of Ser. No. US 830167
PRAI JP 1998-302321 19981023
JP 1998-362827 19981221
JP 1998-365207 19981222
JP 1998-365208 19981222
JP 1998-365209 19981222
DT Utility
FS GRANTED
EXNAM Primary Examiner: Qazi, Sabiha
LREP Sughrue Mion, PLLC
CLMN Number of Claims: 20
ECL Exemplary Claim: 1
DRWN 0 Drawing Figure(s); 0 Drawing Page(s)
LN.CNT 3845
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
AB Compounds expressed by the following general formula (1), ##STR1##

[wherein, R.sub.01 and R.sub.02 are each independently a hydrogen atom or a protecting group for a hydroxyl group; Z is one out of the following formulae (1-1) to (1-5)]. ##STR2##

The compounds can be used as active ingredients of treating agents for inflammatory respiratory diseases, malignant tumors, rheumatoid arthritis, osteoporosis, diabetes mellitus, hypertension, alopecia, acne, psoriasis, dermatitis, hypercalcemia, hypoparathyroidism and metabolic disorder of cartilage.

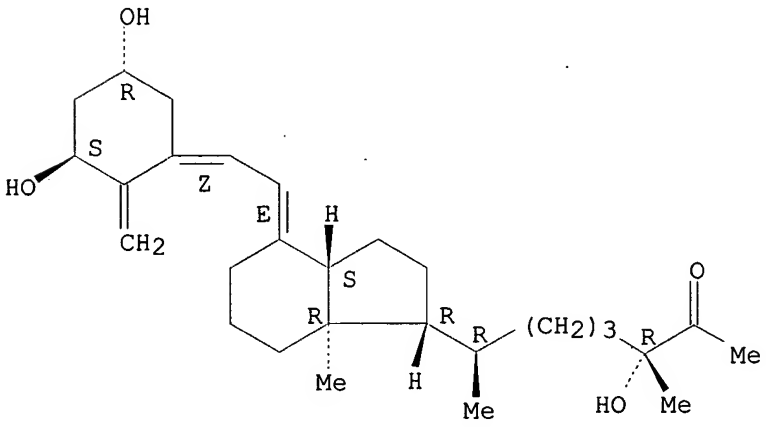
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
IT **266344-71-2P 266344-72-3P 266344-76-7P**
266344-78-9P 266344-80-3P
(prepn. of vitamin D3 derivs. as remedies for inflammatory respiratory

diseases and other diseases)

RN 266344-71-2 USPAT2

CN Ethanone, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-27-nor-9,10-secocholesta-5,7,10(19)-trien-25-yl]- (9CI) (CA INDEX NAME)

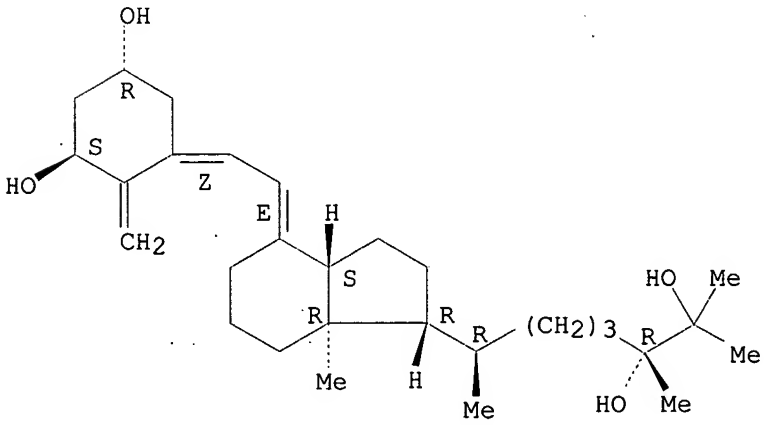
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-72-3 USPAT2

CN 27-Nor-9,10-secocholesta-5,7,10(19)-triene-1,3,25-triol, 25-(1-hydroxy-1-methylethyl)-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

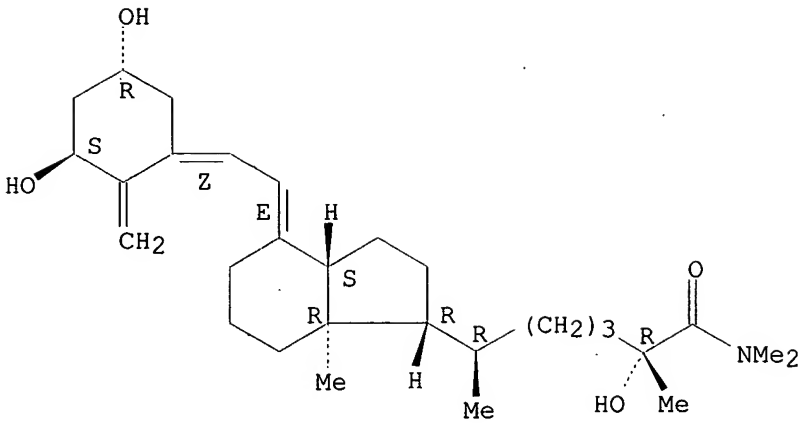
Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-76-7 USPAT2

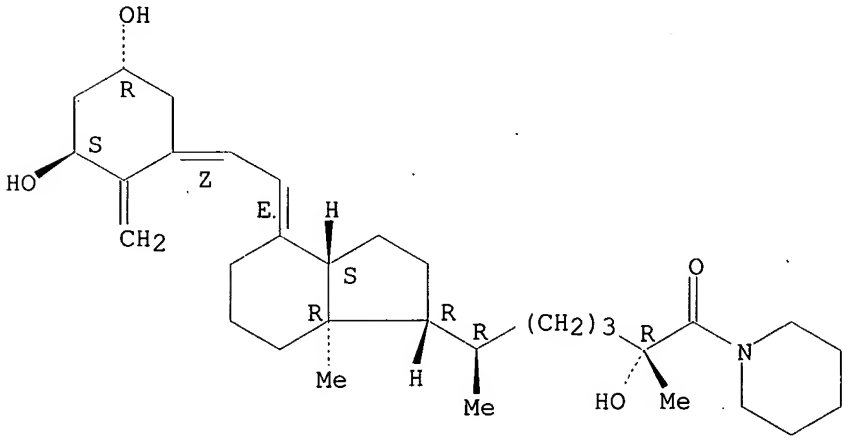
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, 1,3,25-trihydroxy-N,N-dimethyl-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



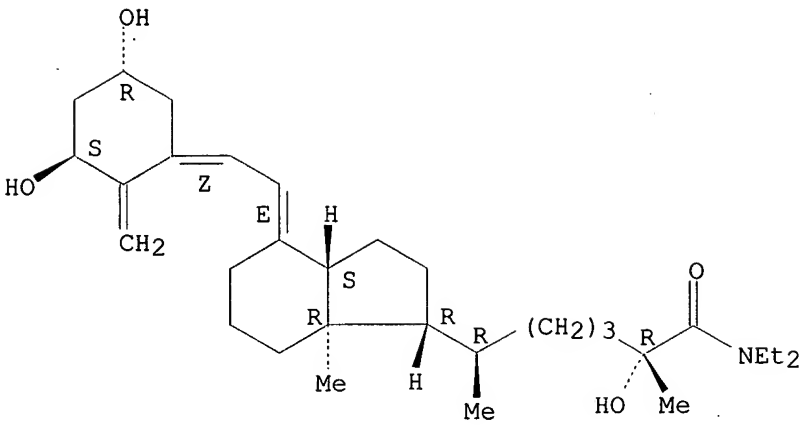
RN 266344-78-9 USPAT2
CN Piperidine, 1-[(1.alpha.,3.beta.,5Z,7E,25R)-1,3,25-trihydroxy-26-oxo-9,10-secocholesta-5,7,10(19)-trien-26-yl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 266344-80-3 USPAT2
CN 9,10-Secocholesta-5,7,10(19)-trien-26-amide, N,N-diethyl-1,3,25-trihydroxy-, (1.alpha.,3.beta.,5Z,7E,25R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.


OH
R
S
HO
Z
E
H
CH2
S
R
R
R
(CH2)3
R
O
NEt2
Me
H
Me
HO
Me